

[MS-HTML5]:

Microsoft Edge / Internet Explorer HTML5 Standards Support Document

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Revision Summary

Date	Revision History	Revision Class	Comments
4/17/2015	1.0	New	Released new document
7/7/2015	1.1	Minor	Clarified the meaning of the technical content.
11/2/2015	1.2	Minor	Clarified the meaning of the technical content.
3/22/2016	1.3	Minor	Clarified the meaning of the technical content.
7/19/2016	1.4	Minor	Clarified the meaning of the technical content.
11/2/2016	1.4	None	No changes to the meaning, language, or formatting of the technical content.
3/14/2017	1.4	None	No changes to the meaning, language, or formatting of the technical content.
10/3/2017	1.4	None	No changes to the meaning, language, or formatting of the technical content.
1/23/2018	1.4	None	No changes to the meaning, language, or formatting of the technical content.
2/22/2018	1.4	None	No changes to the meaning, language, or formatting of the technical content.
3/23/2018	1.4	None	No changes to the meaning, language, or formatting of the technical content.
8/28/2018	1.5	Minor	Clarified the meaning of the technical content.

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1 Introduction

This document describes the level of support provided by Microsoft web browsers for the *HTML5 Specification* [\[HTML5\]](#) W3C Recommendation of 28 October 2014.

The [\[HTML5\]](#) specification contains guidance for authors of webpages and web apps, in addition to authoring tools, conformance checking tools and user agents (browser applications). Statements found in this document apply only to normative requirements in the specification targeted to user agents.

1.1 Glossary

MAY, SHOULD, MUST, SHOULD NOT, MUST NOT: These terms (in all caps) are used as defined in [\[RFC2119\]](#). All statements of optional behavior use either MAY, SHOULD, or SHOULD NOT.

1.2 References

Links to a document in the Microsoft Open Specifications library point to the correct section in the most recently published version of the referenced document. However, because individual documents in the library are not updated at the same time, the section numbers in the documents may not match. You can confirm the correct section numbering by checking the [Errata](#).

1.2.1 Normative References

We conduct frequent surveys of the normative references to assure their continued availability. If you have any issue with finding a normative reference, please contact dochelp@microsoft.com. We will assist you in finding the relevant information.

[HTML5] Berjon, R., Faulkner, S., Leithead, T., Navara, E., et al., Eds., "HTML5 -- A vocabulary and associated APIs for HTML and XHTML", <http://www.w3.org/TR/html5/>

[RFC2119] Bradner, S., "Key words for use in RFCs to Indicate Requirement Levels", BCP 14, RFC 2119, March 1997, <http://www.rfc-editor.org/rfc/rfc2119.txt>

1.2.2 Informative References

None.

1.3 Microsoft Implementations

The following Microsoft web browsers implement some portion of the [\[HTML5\]](#) specification:

- Windows Internet Explorer 9
- Windows Internet Explorer 10
- Internet Explorer 11
- Internet Explorer 11 for Windows 10
- Microsoft Edge

Each browser version may implement multiple document rendering modes. The modes vary from one to another in support of the standard. The following table lists the document modes supported by each browser version.

Browser Version	Document Modes Supported
Internet Explorer 9	Quirks Mode IE7 Mode IE8 Mode IE9 Mode
Internet Explorer 10	Quirks Mode IE7 Mode IE8 Mode IE9 Mode IE10 Mode
Internet Explorer 11	Quirks Mode IE7 Mode IE8 Mode IE9 Mode IE10 Mode IE11 Mode
Internet Explorer 11 for Windows 10	Quirks Mode IE7 Mode IE8 Mode IE9 Mode IE10 Mode IE11 Mode
Microsoft Edge	EdgeHTML Mode

For each variation presented in this document there is a list of the document modes and browser versions that exhibit the behavior described by the variation. All combinations of modes and versions that are not listed conform to the specification. For example, the following list for a variation indicates that the variation exists in three document modes in all browser versions that support these modes:

Quirks Mode, IE7 Mode, and IE8 Mode (All Versions)

1.4 Standards Support Requirements

To conform to [\[HTML5\]](#), a user agent must implement all required portions of the specification. Any optional portions that have been implemented must also be implemented as described by the specification. Normative language is usually used to define both required and optional portions. (For more information, see [\[RFC2119\]](#).)

The following table lists the sections of [HTML5] and whether they are considered normative or informative.

Sections	Normative/Informative
1	Informative
2-11	Normative
12	Informative

1.5 Notation

The following notations are used in this document to differentiate between notes of clarification, variation from the specification, and points of extensibility.

Notation	Explanation
C####	This identifies a clarification of ambiguity in the target specification. This includes imprecise statements, omitted information, discrepancies, and errata. This does not include data formatting clarifications.
V####	This identifies an intended point of variability in the target specification such as the use of MAY, SHOULD, or RECOMMENDED. (See RFC2119 .) This does not include extensibility points.
E####	Because the use of extensibility points (such as optional implementation-specific data) can impair interoperability, this profile identifies such points in the target specification.

For document mode and browser version notation, see also section [1.3](#).

2 Standards Support Statements

This section contains all variations and clarifications for the Microsoft implementation of [\[HTML5\]](#).

- Section [2.1](#) describes normative variations from the MUST requirements of the specification.
- Section [2.2](#) describes clarifications of the MAY and SHOULD requirements.
- Section [2.3](#) describes extensions to the requirements.
- Section [2.4](#) considers error handling aspects of the implementation.
- Section [2.5](#) considers security aspects of the implementation.

2.1 Normative Variations

The following subsections describe normative variations from the MUST requirements of [\[HTML5\]](#).

2.1.1 [HTML5] Section 2.4.1 Common parser idioms

V0001: The white space character definitions do not include all the code points with Unicode property "White_Space"

The specification states:

```
2.4.1 Common parser idioms
...
The White Space characters are those that have the Unicode property "White Space" in
the Unicode PropList.txt data file. [UNICODE]
```

All document modes (All versions)

The white space character definitions do not include all the code points with Unicode property "White_Space" listed in the Unicode `PropList.txt` file.

2.1.2 [HTML5] Section 2.4.4.3 Floating-point numbers

V0004: Multiple decimal points in a number are considered valid

The specification states:

```
2.4.4.3 Floating-point numbers
...
The rules for parsing floating-point number values are as given in the following
algorithm. This algorithm must be aborted at the first step that returns something.
This algorithm will return either a number or an error.
...
9. If the character indicated by position is a U+002E FULL STOP (.), and that is
not the last character in input, and the character after the character
indicated by position is an ASCII digit, then set value to zero and jump to
the step labeled fraction.
10. If the character indicated by position is not an ASCII digit, then return an
error.
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

Multiple decimal points in a number are considered valid. All but the first are ignored.

V0005: The absence of a number after "e" or "E", or optional "-" or "+", is considered a valid floating-point number

The specification states:

2.4.4.3 Floating-point numbers

A string is a valid floating-point number if it consists of:

1. Optionally, a U+002D HYPHEN-MINUS character (-).
2. One or both of the following, in the given order:
 1. A series of one or more ASCII digits.
 2. Both of the following, in the given order:
 1. A single U+002E FULL STOP character (.
 2. A series of one or more ASCII digits.
3. Optionally:
 1. Either a U+0065 LATIN SMALL LETTER E character (e) or a U+0045 LATIN CAPITAL LETTER E character (E).
 2. Optionally, a U+002D HYPHEN-MINUS character (-) or U+002B PLUS SIGN character (+).
 3. A series of one or more ASCII digits.

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The absence of a number after "e" or "E", or optional "-" (U+002D) or "+" (U+002B), is considered a valid floating-point number. If there is no sign after the "E" or "e", "+" is assumed. If there is no number, 0 is assumed.

V0002: Characters "d" and "D" can be used in place of "e" and "E" in a floating-point number

The specification states:

2.4.4.3 Floating-point numbers

A string is a valid floating-point number if it consists of:

1. Optionally, a "-" (U+002D) character.
2. One or both of the following, in the given order:
 1. A series of one or more ASCII digits.
 2. ...
 1. A single "." (U+002E) character.
 2. A series of one or more ASCII digits.
3. Optionally:
 1. Either a "e" (U+0065) character or a "E" (U+0045) character.
 2. Optionally, a "-" (U+002D) character or "+" (U+002B) character.
 3. A series of one or more ASCII digits.

All document modes (All versions)

Characters "d" and "D" can be used in place of "e" and "E" in a floating-point number.

2.1.3 [HTML5] Section 2.5.3 Dynamic changes to base URLs

V0006: Changes to the base href value do not update the URLs

The specification states:

2.5.3 Dynamic changes to base URLs

When an `xml:base` attribute is set, changed, or removed, the attribute's element, and all descendant elements, are affected by a base URL change.

When a document's document base URL changes, all elements in that document are affected by a base URL change.

All document modes (All versions)

The document URLs do not change when the `href` values for `xml:base` or the `base` element change.

2.1.4 [HTML5] Section 2.7.2.1 HTMLAllCollection

V0011: The HTMLAllCollection interface is not defined

The specification states:

```
2.7.2.1 HTMLAllCollection
...
interface HTMLAllCollection : HTMLCollection {
    ...
};
```

IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `HTMLAllCollection` interface is not defined.

V0009: The `namedItem` function does not return an `HTMLCollection`

The specification states:

```
2.7.2.1 HTMLAllCollection
...
interface HTMLAllCollection : HTMLCollection {
    ...
    legacycaller getter (HTMLCollection or Element)? namedItem(DOMString name);
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `namedItem` function does not return an `HTMLCollection` if there are multiple matching items and only returns a single `Element`.

V0008: The item function does not return an HTMLCollection

The specification states:

```
2.7.2.1 HTMLAllCollection
...
interface HTMLAllCollection : HTMLCollection {
    ...
    (HTMLCollection or Element)? item(DOMString name);
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `item` function does not return an `HTMLCollection` if there are multiple matching items and only returns a single `Element`.

V0010: The item attribute is not specified on the HTMLAllCollection instance

The specification states:

```
2.7.2.1 HTMLAllCollection
...
interface HTMLAllCollection : HTMLCollection {
    ...
    (HTMLCollection or Element)? item(DOMString name);
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `item` attribute is not specified on the `HTMLAllCollection` instance but is defined on the interface `HTMLCollection`.

V0007: The tags attribute is not supported

The specification states:

```
2.7.2.1 HTMLAllCollection
...
interface HTMLAllCollection : HTMLCollection {
    ...
    HTMLAllCollection tags(DOMString tagName);
};
```

IE11 Mode, IE10 Mode, and IE9 Mode (All versions)

The `tags` attribute is not supported.

2.1.5 [HTML5] Section 2.7.2.2 HTMLFormControlsCollection

V0376: The RadioNodeList interface is not supported

The specification states:

2.7.2.2. The HTMLFormControlsCollection interface

The HTMLFormControlsCollection interface is used for collections of listed elements in form elements.

```
...
interface RadioNodeList : NodeList {
    attribute DOMString value;
};
```

All document modes (All versions)

The RadioNodeList interface is not supported.

V0012: The HTMLFormControlsCollection interface is not supported

The specification states:

2.7.2.2 HTMLFormControlsCollection

The HTMLFormControlsCollection interface is used for collections of listed elements in form and fieldset elements.

```
interface HTMLFormControlsCollection : HTMLCollection {
    ...
};
```

All document modes (All versions)

The HTMLFormControlsCollection interface is not supported.

2.1.6 [HTML5] Section 2.7.2.3 HTMLOptionsCollection

V0013: The HTMLOptionsCollection interface is not supported

The specification states:

2.7.2.3 HTMLOptionsCollection

The HTMLOptionsCollection interface is used for collections of option elements. It is always rooted on a select element and has attributes and methods that manipulate that element's descendants.

```
interface HTMLOptionsCollection : HTMLCollection {
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `HTMLOptionsCollection` interface is not supported.

2.1.7 [HTML5] Section 2.7.6 Callbacks

V0014: The `FileCallback` callback is not supported

The specification states:

```
2.7.6 Callbacks
...
The following callback function type is used in various APIs that interact with File
objects:

    callback FileCallback = void (File file);
```

All document modes (All versions)

The `FileCallback` callback is not supported.

2.1.8 [HTML5] Section 3.1.2 Resource metadata management

V0016: A cookie-averse `Document` object does not raise a `SecurityError` when origin is not a correct tuple

The specification states:

```
3.1.2 Resource metadata management
...
On getting, if the document is a cookie-averse Document object, then the user agent
must return the empty string. Otherwise, if the Document's origin is not a
scheme/host/port tuple, the user agent must throw a SecurityError exception.
```

All document modes (All versions)

A cookie-averse `Document` object does not throw a `SecurityError` when origin is not a scheme/host/port tuple and no exception is thrown.

2.1.9 [HTML5] Section 3.2.2 Elements in the DOM

V0018: The `tabindex` attribute is type short, not long

The specification states:

```
3.2.2 Elements in the DOM
...
    interface HTMLInputElement : Element {
        ...
        attribute long tabIndex;
        ...
    };
```

All document modes (All versions)

The `tabindex` attribute is type `short`, not `long`.

V0017: The `translate` attribute is not supported

The specification states:

```
3.2.2 Elements in the DOM
...
interface HTMLElement : Element {
    ...
    attribute boolean translate;
    ...
};
```

All document modes (All versions)

The `translate` attribute is not supported.

2.1.10 [HTML5] Section 3.2.4.1.7 Interactive content

V0019: A synthetic click does not set the `isTrusted` flag

The specification states:

```
... ...
...
When a user agent is to run synthetic click activation steps on an element, the user
agent must run the following steps:
...
4. Fire a click event at the element. If the run synthetic click activation steps
algorithm was invoked because the click() method was invoked, then the
isTrusted attribute must be initialized to false.
```

All document modes (All versions)

A synthetic click does not set the `isTrusted` flag.

2.1.11 [HTML5] Section 3.2.5.4 The `translate` attribute

V0020: The `translate` attribute is not supported

The specification states:

```
... The translate attribute

The translate attribute is an enumerated attribute that is used to specify whether an
element's attribute values and the values of its Text node children are to be
translated when the page is localized, or whether to leave them unchanged.
```

All document modes (All versions)

The `translate` attribute is not supported.

2.1.12 [HTML5] Section 3.2.5.6 The `dir` attribute

V0021: The `auto` keyword is not supported

The specification states:

... The `dir` attribute

The `dir` attribute specifies the element's text directionality. The attribute is an enumerated attribute with the following keywords and states:

...

The `auto` keyword, which maps to the `auto` state

Indicates that the contents of the element are explicitly directionally isolated text, but that the direction is to be determined programmatically using the contents of the element (as described below).

All document modes (All versions)

The `auto` keyword is not supported.

2.1.13 [HTML5] Section 3.2.5.9 Embedding custom non-visible data with the `data-*` attributes

V0022: A `data-` attribute that contains an uppercase letter after a dash does not insert a dash before the character

The specification states:

3.2.5.9 Embedding custom non-visible data with the `data-*` attributes

...

The algorithm for setting names to certain values

...

4. For each uppercase ASCII letter in `name`, insert a U+002D HYPHEN-MINUS character (-) before the character and replace the character with the same character converted to ASCII lowercase.

All document modes (All versions)

A `data-` attribute that contains an uppercase letter after a dash does not insert a dash before the character.

V0023: A `SyntaxError` is not thrown when setting a `data-` attribute that contains a dash in the name

The specification states:

3.2.5.9 Embedding custom non-visible data with the `data-*` attributes

...

The algorithm for setting names to certain values

...

3. If `name` contains a "-" (U+002D) character followed by a lowercase ASCII

letter, throw a `SyntaxError` exception and abort these steps.

All document modes (All versions)

A `SyntaxError` is not thrown when setting a `data-` attribute that contains a dash in the name (e.g. `data-to-string`).

2.1.14 [HTML5] Section 4.2.2 The title element

V0025: The text attribute of the title element does not remove leading and trailing white space from the returned string.

The specification states:

```
4.2.2 The title element
...
The IDL attribute text must return ...
```

All document modes (All versions)

The `text` attribute of the `title` element does not remove leading and trailing white space from the returned string.

V0024: The directionality set in the title element does not affect the title used in the window tab

The specification states:

```
4.2.2 The title element
...
User agents should use the document's title when referring to the document in their
user interface. When the contents of a title element are used in this way, the
directionality of that title element should be used to set the directionality of the
document's title in the user interface.
```

All document modes (All versions)

The directionality set in the `title` element does not affect the title used in the window tab.

2.1.15 [HTML5] Section 4.2.3 The base element

V0027: When `href` of `HTMLBaseElement` does not exist, it returns the empty string, not the full URL

The specification states:

```
4.2.3 The base element
...
The href IDL attribute, on getting, must return the result of running the following
algorithm:
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

When the `href` attribute of `HTMLBaseElement` does not exist, it returns the empty string (`""`), not the full URL.

V0026: When `href` of `HTMLBaseElement` is the empty string, it returns the empty string, not the full URL

The specification states:

```
4.2.3 The base element
...
The href IDL attribute, on getting, must return the result of running the following algorithm:
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

When `href` of `HTMLBaseElement` is the empty string, it returns the empty string (`""`), not the full URL.

2.1.16 [HTML5] Section 4.2.4 The link element

V0029: The `sizes` attribute is not supported

The specification states:

```
4.2.4 The link element
...
Content attributes
  Global attributes
  ...
  sizes – Sizes of the icons (for rel="icon")
```

All document modes (All versions)

The `sizes` attribute is not supported.

V0028: The `crossorigin` attribute is not supported

The specification states:

```
4.2.4 The link element
...
The crossorigin attribute is a CORS settings attribute. It is intended for use with external resource links.
```

IE10 Mode and IE9 Mode (All versions)

The `crossorigin` attribute is not supported.

2.1.17 [HTML5] Section 4.2.6 The style element

V0031: The disabled attribute is not supported

The specification states:

```
4.2.6 The style element
...
The disabled IDL attribute behaves as defined for the alternative style sheets DOM.
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The disabled attribute is not supported.

V0032: No error event is fired on the style element in the case of a Content-Type mismatch

The specification states:

```
4.2.6 The style element
...
Once the attempts to obtain the style sheet's critical subresources, if any, are complete, or, if the style sheet has no critical subresources, once the style sheet has been parsed and processed, the user agent must, if the loads were successful or there were none, queue a task to fire a simple event named load at the style element, or, if one of the style sheet's critical subresources failed to completely load for any reason (e.g. DNS error, HTTP 404 response, a connection being prematurely closed, unsupported Content-Type), queue a task to fire a simple event named error at the style element. ...
```

All document modes (All versions)

No error event is fired on the style element in the case of a Content-Type mismatch.

2.1.18 [HTML5] Section 4.3.1 The body element

V0033: The onerror event handler does not replace the generic event handler

The specification states:

```
4.3.1 The body element
...
The onblur, onerror, onfocus, onload, onresize, and onscroll event handlers of the Window object, exposed on the body element, replace the generic event handlers with the same names normally supported by HTML elements.
```

All document modes (All versions)

The onerror event handler does not replace the generic event handler.

V0035: The onpagehide and onpageshow event handlers are not supported

The specification states:

```
4.3.1 The body element
...
Content attributes:
...
onpagehide
onpageshow
```

IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `onpagehide` and `onpageshow` event handlers are not supported.

V0036: The `onpopstate` event handler is not supported

The specification states:

```
4.3.1 The body element
...
Content attributes:
...
onpopstate
...
```

IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `onpopstate` event handler is not supported.

V0034: The `onscroll` event handler does not replace the generic event handler

The specification states:

```
4.3.1 The body element
...
The onblur, onerror, onfocus, onload, onresize, and onscroll event handlers of the
Window object, exposed on the body element, replace the generic event handlers with
the same names normally supported by HTML elements.
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `onscroll` event handler does not replace the generic event handler.

2.1.19 [HTML5] Section 4.3.10.1 Creating an outline

V0037: There is no graphical outline mechanism

The specification states:

```
... Creating an outline
...
The outline for a sectioning content element or a sectioning root element consists of
a list of one or more potentially nested sections. ...
```

All document modes (All versions)

There is no graphical outline mechanism.

2.1.20 [HTML5] Section 4.4.5 The ol element

V0038: The reversed attribute is not supported

The specification states:

```
... The ol element
...
The reversed attribute is a boolean attribute. If present, it indicates that the list
is a descending list (... , 3, 2, 1). If the attribute is omitted, the list is an
ascending list (1, 2, 3, ...).
```

All document modes (All versions)

The reversed attribute is not supported.

2.1.21 [HTML5] Section 4.5.1 The a element

V0041: The URLUtils interface is not implemented for the HTMLAnchorElement interface

The specification states:

```
4.5.1 The a element
...
HTMLAnchorElement implements URLUtils;
```

All document modes (All versions)

The `URLUtils` interface is not implemented for the `HTMLAnchorElement` interface.

However, some `URLUtils` attributes are implemented on instances of `HTMLAnchorElement`. They are:

```
href
protocol
host
hostname
port
pathname
search
hash
```

These are not implemented:

```
username
```

```
password
searchParams
origin
```

V0039: The download attribute is not supported

The specification states:

```
4.5.1 The a element
...
interface HTMLAnchorElement : HTMLElement {
    ...
    attribute DOMString download;
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The download attribute is not supported.

2.1.22 [HTML5] Section 4.5.10 The data element

V0042: The data element is not supported

The specification states:

```
4.5.10 The data element
...
interface HTMLDataElement : HTMLElement {
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The data element is not supported.

2.1.23 [HTML5] Section 4.5.11 The time element

V0043: The time element is not supported

The specification states:

```
4.5.11 The time element
...
interface HTMLTimeElement : HTMLElement {
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `time` element is not supported.

2.1.24 [HTML5] Section 4.5.22 The `rb` element

V0044: An `rb` element with no end tag does not properly close

The specification states:

```
4.5.22 The rb element
...
An rb element's end tag may be omitted if the rb element is immediately followed by
an rb, rt, rtc or rp element, or if there is no more content in the parent element.
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

An `rb` element with no end tag does not properly close when immediately followed by any of the following elements `rb`, `rt`, `rtc`, `rp`.

2.1.25 [HTML5] Section 4.5.24 The `rtc` element

V0045: The `rtc` element is not supported

The specification states:

```
... The rtc element
...
The rtc element marks a ruby text container for ruby text components in a ruby
annotation. ...
```

All document modes (All versions)

The `rtc` element is not supported.

2.1.26 [HTML5] Section 4.5.26 The `bdi` element

V0046: The `bdi` element is not supported

The specification states:

```
4.5.26 The bdi element
...
The bdi element represents a span of text that is to be isolated from its
surroundings for the purposes of bidirectional text formatting.
```

All document modes (All versions)

The `bdi` element is not supported.

2.1.27 [HTML5] Section 4.7.1 The `img` element

V0048: The first page of a PDF document is not displayed when set in the `img` element

The specification states:

```
... The img element
...
... User agents must only display the first page of a multipage resource. ...
```

All document modes (All versions)

The first page of a PDF document is not displayed when set in the `img` element.

2.1.28 [HTML5] Section 4.7.3 The `embed` element

V0050: The `type` attribute is not supported

The specification states:

```
... The embed element
...
DOM interface:

    interface HTMLEmbedElement : HTMLElement {
        ...
        attribute DOMString type;
        ...
    };
```

All document modes (All versions)

The `type` attribute is not supported.

2.1.29 [HTML5] Section 4.7.4 The `object` element

V0051: The `typeMustMatch` attribute is not supported

The specification states:

```
... The object element
...
DOM interface:

    interface HTMLObjectElement : HTMLElement {
        ...
        attribute boolean typeMustMatch;
        ...
    };
```

All document modes (All versions)

The `typeMustMatch` attribute is not supported.

2.1.30 [HTML5] Section 4.7.6 The video element

V0053: The `crossorigin` attribute is not supported

The specification states:

```
4.7.6 The video element
...
Content attributes:
  Global attributes
  ...
  crossorigin - How the element handles crossorigin requests
  ...
```

All document modes (All versions)

The `crossorigin` attribute is not supported.

2.1.31 [HTML5] Section 4.7.8 The source element

V0054: Appending a source element using `appendChild` does not invoke the resource selection algorithm when the element is appended

The specification states:

```
... The source element
...
If a source element is inserted as a child of a media element that has no src
attribute and whose networkState has the value NETWORK_EMPTY, the user agent must
invoke the media element's resource selection algorithm.
```

All document modes (All versions)

Appending a `source` element using `appendChild` does not invoke the resource selection algorithm when the element is appended.

2.1.32 [HTML5] Section 4.7.9 The track element

V0056: The five unsigned short values of `HTMLTrackElement` are not supported

The specification states:

```
4.7.9 The track element
...
interface HTMLTrackElement : HTMLElement {
  ...
  const unsigned short NONE = 0;
  const unsigned short LOADING = 1;
```

```
    const unsigned short LOADED = 2;
    const unsigned short ERROR = 3;
    readonly attribute unsigned short readyState;
    ...
};
```

IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The five unsigned short values `NONE`, `LOADING`, `LOADED`, `ERROR`, and `readyState` are not supported.

V0055: The track element is not supported

The specification states:

```
4.7.9 The track element
...
interface HTMLTrackElement : HTMLElement {
    ...
};
```

IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `track` element is not supported.

2.1.33 [HTML5] Section 4.7.10 Media elements

V0059: The `getStartDate` function is not supported

The specification states:

```
... Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
    // playback state
    ...
    ... getStartDate();
    ...
};
```

All document modes (All versions)

The `getStartDate` function is not supported.

V0057: The `crossOrigin` attribute is not supported

The specification states:

```
4.7.10 Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
    attribute DOMString crossOrigin;
};
```

```
}; ...
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `crossOrigin` attribute is not supported.

V0066: The `videoTracks` attribute is not supported

The specification states:

```
4.7.10 Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
    readonly attribute VideoTrackList videoTracks;
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `videoTracks` attribute is not supported.

V0065: The `HTMLMediaElement` interface is not supported

The specification states:

```
4.7.10 Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
};
```

IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `HTMLMediaElement` interface is not supported.

V0061: The `controller` attribute is not supported

The specification states:

```
4.7.10 Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
    attribute MediaController? controller;
    ...
};
```

All document modes (All versions)

The `controller` attribute is not supported.

V0064: The `audioTracks` and `textTracks` attributes are not supported

The specification states:

```
4.7.10 Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
    readonly attribute AudioTrackList audioTracks;
    ...
    readonly attribute TextTrackList textTracks;
    ...
};
```

IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `audioTracks` and `textTracks` attributes are not supported.

V0058: The `canPlayType` function returns a `DOMString`, not a `CanPlayTypeEnum`

The specification states:

```
4.7.10 Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
    CanPlayTypeEnum canPlayType(DOMString type);
    ...
};
```

All document modes (All versions)

The `canPlayType` function returns a `DOMString`, not a `CanPlayTypeEnum`.

V0062: The `addTextTrack` function is not supported

The specification states:

```
4.7.10 Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
    TextTrack addTextTrack(TextTrackKind kind, optional DOMString label = "",
        optional DOMString language = "");
};
```

IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The `addTextTrack` function is not supported.

V0060: The mediaGroup attribute is not supported

The specification states:

```
4.7.10 Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
    attribute DOMString mediaGroup;
    ...
};
```

All document modes (All versions)

The mediaGroup attribute is not supported.

V0067: The CanPlayTypeEnum enum is not supported

The specification states:

```
4.7.10 Media elements
...
enum CanPlayTypeEnum { "" /* empty string */, "maybe", "probably" };
```

All document modes (All versions)

The CanPlayTypeEnum enum is not supported.

V0063: The defaultMuted attribute is not supported

The specification states:

```
4.7.10 Media elements
...
interface HTMLMediaElement : HTMLElement {
    ...
    attribute boolean defaultMuted;
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The defaultMuted attribute is not supported.

2.1.34 [HTML5] Section 4.7.10.2 Location of the media resource

V0069: The resource selection algorithm does not set currentSrc to an absolute URL

The specification states:

```
... Location of the media resource
```

...
The `currentSrc` IDL attribute is initially the empty string. Its value is changed by the resource selection algorithm defined below.

All document modes (All versions)

The resource selection algorithm does not set `currentSrc` to an absolute URL; the file name is missing.

2.1.35 [HTML5] Section 4.7.10.5 Loading the media resource

V0071: The suspend event is not fired when `preload=none`

The specification states:

```
... Loading the media resource
...
The resource fetch algorithm for a media element and a given absolute URL ... is as follows:
...
... Optionally, run the following substeps. This is the expected behavior if the user agent intends to not attempt to fetch the resource until the user requests it explicitly (e.g. as a way to implement the preload attribute's none keyword).
...
    2. Queue a task to fire a simple event named suspend at the element ...
```

All document modes (All versions)

The suspend event is not fired when `preload=none`.

V0074: When the mode is attribute, the error events do not fire properly

The specification states:

```
4.7.10.5 Loading the media resource
...
The resource selection algorithm for a media element is as follows. ...
...
    9. If mode is attribute, then run these substeps:
...
    6. Failed with attribute: Reaching this step indicates that the media resource failed to load or that the given URL could not be resolved. Queue a task to run the following steps, using the DOM manipulation task source:
...
    5. Fire a simple event named error at the media element.
```

All document modes (All versions)

When the mode is attribute, the error events do not fire properly.

V0073: The resource selection algorithm does not set the `networkState` correctly when load, play, or pause is called

The specification states:

```
4.7.10.5 Loading the media resource
...
The resource selection algorithm for a media element is as follows. ...
...
6. If the media element has a src attribute, then let mode be attribute.

Otherwise, if the media element does not have a src attribute but has a
source element child, then let mode be children and let candidate be the
first such source element child in tree order.

Otherwise the media element has neither a src attribute nor a source element
child: set the networkState to NETWORK_EMPTY, and abort these steps; the
synchronous section ends.
```

All document modes (All versions)

The resource selection algorithm does not set the `networkState` correctly when `load`, `play` or `pause` is called.

V0070: The `loadstart` event is not fired when a source element is added to a video element

The specification states:

```
... Loading the media resource
...
The resource selection algorithm for a media element is as follows. ...
...
8. Queue a task to fire a simple event named loadstart at the media element.
```

All document modes (All versions)

The `loadstart` event is not fired when a source element is added to a video element.

V0072: The network state is not set to `NETWORK_EMPTY` if `src` is empty

The specification states:

```
4.7.10.5 Loading the media resource
...
The resource fetch algorithm for a media element and a given absolute URL is as
follows:
...
4. Perform a potentially CORS-enabled fetch of the current media resource's
absolute URL, with the mode being the state of the media element's
crossorigin content attribute, the origin being the origin of the media
element's Document, and the default origin behaviour set to taint.
...
The networking task source tasks to process the data as it is being fetched
must, when appropriate, include the relevant substeps from the following list:
...
If the media data is corrupted
Fatal errors in decoding the media data that occur after the user
agent has established whether the current media resource is usable
must cause the user agent to execute the following steps:
...
4. If the media element's readyState attribute has a value equal
```

to HAVE_NOTHING, set the element's networkState attribute to the NETWORK_EMPTY value, set the element's show poster flag to true, and fire a simple event named emptied at the element.

All document modes (All versions)

The networkState is not set to NETWORK_EMPTY if src is empty.

V0075: The src attribute incorrectly resolves invalid data: URLs as valid

The specification states:

```
4.7.10.5 Loading the media resource
...
The resource selection algorithm for a media element is as follows. ...
...
... If mode is attribute ...
...
3. If absolute URL was obtained successfully, set the currentSrc attribute
to absolute URL.
```

All document modes (All versions)

The src attribute incorrectly resolves invalid data: URLs as valid.

2.1.36 [HTML5] Section 4.7.10.6 Offsets into the media resource

V0076: The currentTime attribute returns a negative value if readyState is HAVE_NOTHING

The specification states:

```
... Offsets into the media resource
...
The currentTime attribute must, on getting, return the media element's default
playback start position, unless that is zero, in which case it must return the
element's official playback position. ...
```

All document modes (All versions)

The currentTime attribute returns a negative value if readyState is HAVE_NOTHING.

2.1.37 [HTML5] Section 4.7.10.9 Seeking

V0077: The currentTime attribute updates asynchronously

The specification states:

```
... Seeking
...
When the user agent is required to seek to a particular new playback position in the
media resource, optionally with the approximate-for-speed flag set, it means that the
user agent must run the following steps. ...
```

```
...
... Set the current playback position to the ... new playback position.
```

All document modes (All versions)

The `currentTime` attribute updates asynchronously.

2.1.38 [HTML5] Section 4.7.10.10.1 AudioTrackList and VideoTrackList objects

V0082: At least one `videoTrack` in a `videoTrackList` must be selected

The specification states:

```
... AudioTrackList and VideoTrackList objects
...
A VideoTrackList object represents a dynamic list of zero or more video tracks, of
which zero or one can be selected at a time. ...
```

All document modes (All versions)

At least one `VideoTrack` in a `VideoTrackList` must be selected.

V0084: `AudioTrack.kind` and `VideoTrack.kind` do not check that the category is appropriate for the media type

The specification states:

```
... AudioTrackList and VideoTrackList objects
...
... Categories must only be returned for AudioTrack objects if they are appropriate
for audio, and must only be returned for VideoTrack objects if they are appropriate
for video.
```

All document modes (All versions)

`AudioTrack.kind` and `VideoTrack.kind` do not check that the category is appropriate for the media type.

V0078: The `AudioTrack` attributes `kind` and `language` are not readonly

The specification states:

```
... AudioTrackList and VideoTrackList objects
...
interface AudioTrack {
    ...
    readonly attribute DOMString kind;
    ...
    readonly attribute DOMString language;
    ...
};
```

All document modes (All versions)

The `AudioTrack` attributes `kind` and `language` are not readonly.

V0083: Media Fragments URI fragment identifiers are not supported

The specification states:

```
... AudioTrackList and VideoTrackList objects
...
... If the media resource is in a format that supports the Media Fragments URI
fragment identifier syntax, the identifier returned for a particular track must be
the same identifier that would enable the track if used as the name of a track in the
track dimension of such a fragment identifier. ...
```

All document modes (All versions)

Media Fragments URI fragment identifiers are not supported.

V0085: `AudioTrack.language` and `VideoTrack.language` return RFC-1766 language tags

The specification states:

```
... AudioTrackList and VideoTrackList objects
...
The AudioTrack.language and VideoTrack.language attributes must return the BCP 47
language tag of the language of the track, if it has one, or the empty string
otherwise. ...
```

All document modes (All versions)

`AudioTrack.language` and `VideoTrack.language` return RFC-1766 language tags.

V0086: The `resize` event does not fire on a `resize`

The specification states:

```
... AudioTrackList and VideoTrackList objects
...
Whenever a track in a VideoTrackList that was previously not selected is selected ...
the user agent must queue a task to fire a simple event named change at the
VideoTrackList object. This task must be queued before the task that fires the resize
event, if any.
```

All document modes (All versions)

The `resize` event does not fire on a `resize`.

V0080: The `VideoTrack` and `VideoTrackList` interfaces are not supported

The specification states:

```
4.7.10.10.1 AudioTrackList and VideoTrackList objects
...
interface VideoTrackList : EventTarget {
    ...
};

interface VideoTrack {
    ...
};
```

IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The VideoTrack and VideoTrackList interfaces are not supported.

V0081: The onremovetrack attribute of AudioTrackList is not supported

The specification states:

```
4.7.10.10.1 AudioTrackList and VideoTrackList objects
...
interface AudioTrackList : EventTarget {
    ...
    attribute EventHandler onremovetrack;
};
```

IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The onremovetrack attribute of AudioTrackList is not supported.

V0079: The AudioTrack and AudioTrackList interfaces are not supported

The specification states:

```
4.7.10.10.1 AudioTrackList and VideoTrackList objects
...
interface AudioTrackList : EventTarget {
    ...
};

interface AudioTrack {
    ...
};
```

IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)

The AudioTrack and AudioTrackList interfaces are not supported.

2.1.39 [HTML5] Section 4.7.10.10.2 Selecting specific audio and video tracks declaratively

V0087: Declarative selection of tracks is not supported

The specification states:

```
... Selecting specific audio and video tracks declaratively
```

```
The audioTracks and videoTracks attributes allow scripts to select which track should play, but it is also possible to select specific tracks declaratively, by specifying particular tracks in the fragment identifier of the URL of the media resource. The format of the fragment identifier depends on the MIME type of the media resource.
```

All document modes (All versions)

Declarative selection of tracks is not supported.

2.1.40 [HTML5] Section 4.7.10.11 Synchronizing multiple media elements

V0088: The MediaController interface is not supported

The specification states:

```
4.7.10.11.1 Introduction
```

```
Each media element can have a MediaController. A MediaController is an object that coordinates the playback of multiple media elements, for instance so that a sign-language interpreter track can be overlaid on a video track, with the two being kept in sync.
```

All document modes (All versions)

The MediaController interface is not supported.

2.1.41 [HTML5] Section 4.7.10.12.1 Text track model

V0089: The change event is not fired when the text track mode changes

The specification states:

```
... Text track model
```

```
...  
Whenever a text track that is in a media element's list of text tracks has its text track mode change value, the user agent must run the following steps for the media element:
```

- ```
...
3. Queue a task that runs the following substeps:
...
2. Fire a simple event named change at the media element's textTracks attribute's TextTrackList object.
```

### **All document modes (All versions)**

The change event is not fired when the text track mode changes.

## 2.1.42 [HTML5] Section 4.7.10.12.2 Sourcing in-band text tracks

V0090: Ogg files are not supported

The specification states:

```
... Sourcing in-band text tracks
...
When a media resource contains data that the user agent recognises and supports as
being equivalent to a text track, the user agent runs the steps to expose a
media-resource-specific text track with the relevant data, as follows.
...
4. If the new text track's kind is metadata, then set the text track in-band
metadata track dispatch type as follows, based on the type of the media
resource:

 If the media resource is an Ogg file

 The text track in-band metadata track dispatch type must be set to
 the value of the Role header field.
```

### **All document modes (All versions)**

Ogg files are not supported.

V0095: MPEG-2 files are not supported

The specification states:

```
4.7.10.12.2 Sourcing in-band text tracks
...
When a media resource contains data that the user agent recognises and supports as
being equivalent to a text track, the user agent runs the steps to expose a
media-resource-specific text track with the relevant data, as follows.
...
4. If the new text track's kind is metadata, then set the text track in-band
metadata track dispatch type as follows, based on the type of the media
resource:
...
 If the media resource is an MPEG-2 file

 Let stream type be the value of the "stream_type" field describing the
 text track's type in the file's program map section, interpreted as an
 8-bit unsigned integer. ...
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

MPEG-2 files are not supported.

V0093: DASH metadata is not supported

The specification states:

```
... Sourcing in-band text tracks
...
When a media resource contains data that the user agent recognises and supports as
being equivalent to a text track, the user agent runs the steps to expose a
```

media-resource-specific text track with the relevant data, as follows.

- ...
- 4. If the new text track's kind is metadata, then set the text track in-band metadata track dispatch type as follows, based on the type of the media resource:

- ...
- If the media resource is a DASH media resource

- The text track in-band metadata track dispatch type must be set to the concatenation of the "AdaptationSet" element attributes and all child Role descriptors.

### **All document modes (All versions)**

DASH metadata is not supported.

V0092: MPEG-4 metadata is not supported

The specification states:

... Sourcing in-band text tracks

...

When a media resource contains data that the user agent recognises and supports as being equivalent to a text track, the user agent runs the steps to expose a media-resource-specific text track with the relevant data, as follows.

- ...
- 4. If the new text track's kind is metadata, then set the text track in-band metadata track dispatch type as follows, based on the type of the media resource:

- ...
- If the media resource is an MPEG-4 file

- Let the first stsd box of the first stbl box of the first minf box of the first mdia box of the text track's trak box in the first moov box of the file be the stsd box, if any. ...

### **All document modes (All versions)**

MPEG-4 metadata is not supported.

V0091: WebM files are not supported

The specification states:

... Sourcing in-band text tracks

...

When a media resource contains data that the user agent recognises and supports as being equivalent to a text track, the user agent runs the steps to expose a media-resource-specific text track with the relevant data, as follows.

- ...
- 4. If the new text track's kind is metadata, then set the text track in-band metadata track dispatch type as follows, based on the type of the media resource:

- ...
- If the media resource is a WebM file

- The text track in-band metadata track dispatch type must be set to the value of the CodecID element.

### **All document modes (All versions)**

WebM files are not supported.

V0094: MPEG-2 support is limited to HLS and ID3 timed metadata

The specification states:

```
... Sourcing in-band text tracks
...
When a media resource contains data that the user agent recognises and supports as
being equivalent to a text track, the user agent runs the steps to expose a
media-resource-specific text track with the relevant data, as follows.
...
4. If the new text track's kind is metadata, then set the text track in-band
 metadata track dispatch type as follows, based on the type of the media
 resource:
 ...
 If the media resource is an MPEG-2 file

 Let stream type be the value of the "stream_type" field describing the
 text track's type in the file's program map section, interpreted as an
 8-bit unsigned integer. ...
```

### **EdgeHTML Mode (All versions)**

MPEG-2 support is limited to HLS only. MPEG-2 metadata support is limited to ID3 timed metadata.

## **2.1.43 [HTML5] Section 4.7.10.12.3 Sourcing out-of-band text tracks**

V0098: Text track selection is based on the default attribute only

The specification states:

```
... Sourcing out-of-band text tracks
...
When the steps above say to perform automatic text track selection for one or more
text track kinds, it means to run the following steps:
...
4. If the user has expressed an interest in having a track from candidates
 enabled based on its text track kind, text track language, and text track
 label, then set its text track mode to showing.
 ...
 Otherwise, if there are any text tracks in candidates that correspond to
 track elements with a default attribute set whose text track mode is set to
 disabled, then set the text track mode of the first such track to showing.
```

### **IE11 Mode, IE10 Mode, and EdgeHTML Mode (All versions)**

Text track selection is based on the `default` attribute only.

V0097: The `removetrack` event does not fire when a text track is removed

The specification states:

... Sourcing out-of-band text tracks  
...  
When a track element's parent element changes and the old parent was a media element, then the user agent must remove the track element's corresponding text track from the media element's list of text tracks, and then queue a task to fire a trusted event with the name `removetrack`, that does not bubble and is not cancelable, and that uses the `TrackEvent` interface, with the `track` attribute initialized to the text track's `TextTrack` object, at the media element's `textTracks` attribute's `TextTrackList` object.

### **IE11 Mode, IE10 Mode, and EdgeHTML Mode (All versions)**

The `removetrack` event does not fire when a text track is removed.

### **V0096: No error event fires if the fetching algorithm fails**

The specification states:

... Sourcing out-of-band text tracks  
...  
If the fetching algorithm fails for any reason (network error, the server returns an error code, a cross-origin check fails, etc), if URL is the empty string, or if the type of the resource is not a supported text track format, then run these steps:

1. Queue a task to first change the text track readiness state to failed to load and then fire a simple event named `error` at the track element.

### **All document modes (All versions)**

No error event fires if the fetching algorithm fails.

### **V0099: The `crossorigin` attribute is not supported**

The specification states:

4.7.10.12.3 Sourcing out-of-band text tracks  
...  
When a user agent is to start the track processing model for a text track and its track element, it must run the following algorithm.  
...  
8. If the track element's parent is a media element then let CORS mode be the state of the parent media element's `crossorigin` content attribute. Otherwise, let CORS mode be No CORS.  
...  
10. If URL is not the empty string, perform a potentially CORS-enabled fetch of URL, with the mode being CORS mode, the origin being the origin of the track element's Document, and the default origin behaviour set to fail.  
  
The resource obtained in this fashion, if any, contains the text track data. If any data is obtained, it is by definition CORS-same-origin (cross-origin resources that are not suitably CORS-enabled do not get this far).

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `crossorigin` attribute is not supported.

## 2.1.44 [HTML5] Section 4.7.10.12.5 Text track API

V0100: The TextTrackList interface does not define the onchange or onremovetrack event handlers

The specification states:

```
... Text track API
...
interface TextTrackList : EventTarget {
 ...
 attribute EventHandler onchange;
 ...
 attribute EventHandler onremovetrack;
};
```

### **All document modes (All versions)**

The TextTrackList interface does not define the onchange or onremovetrack event handlers.

V0104: The TextTrackMode and TextTrackKind enums are not defined

The specification states:

```
... Text track API
...
enum TextTrackMode { "disabled", "hidden", "showing" };
enum TextTrackKind { "subtitles", "captions", "descriptions", "chapters",
"metadata" };
```

### **All document modes (All versions)**

The TextTrackMode and TextTrackKind enums are not defined.

V0107: The cues and activeCues attributes are not defined as nullable types

The specification states:

```
... Text track API
...
interface TextTrack : EventTarget {
 ...
 readonly attribute TextTrackCueList? cues;
 readonly attribute TextTrackCueList? activeCues;
 ...
};
```

### **All document modes (All versions)**

The cues and activeCues attributes are not defined as nullable types:

```
readonly attribute TextTrackCueList cues;
readonly attribute TextTrackCueList activeCues;
```

V0101: The TextTrackList interface does not define the getter correctly

The specification states:

```
... Text track API
...
interface TextTrackList : EventTarget {
 ...
 getter TextTrack (unsigned long index);
 ...
};
```

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The TextTrackList interface does not define the getter correctly:

```
getter TextTrack item(unsigned long index);
```

V0105: The kind attribute returns a DOMString, not a TextTrackKind

The specification states:

```
... Text track API
...
interface TextTrack : EventTarget {
 readonly attribute TextTrackKind kind;
 ...
};
```

**All document modes (All versions)**

The kind attribute returns a DOMString, not a TextTrackKind.

V0102: The TextTrackList interface does not define the onaddtrack event handler

The specification states:

```
4.7.10.12.5 Text track API

interface TextTrackList : EventTarget {
 ...
 attribute EventHandler onaddtrack;
 ...
};
```

**IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The TextTrackList interface does not define the onaddtrack event handler.

V0103: The TextTrackList interface does not define the getTrackById function

The specification states:

```

... Text track API

interface TextTrackList : EventTarget {
 ...
 TextTrack? getTrackById(DOMString id);
 ...
};

```

### **All document modes (All versions)**

The `TextTrackList` interface does not define the `getTrackById` function.

V0106: The `addCue` and `removeCue` functions are not supported

The specification states:

```

4.7.10.12.5 Text track API
...
interface TextTrack : EventTarget {
 ...
 void addCue(TextTrackCue cue);
 void removeCue(TextTrackCue cue);
 ...
};

```

### **IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `addCue` and `removeCue` functions are not supported.

V0110: The `track` attribute does not return a nullable type

The specification states:

```

... Text track API
...
interface TextTrackCue : EventTarget {
 readonly attribute TextTrack? track;
 ...
};

```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `track` attribute does not return a nullable type:

```

readonly attribute TextTrack track;

```

V0108: The `id` and `inBandMetadataTrackDispatchType` attributes are not supported

The specification states:

```

... Text track API
...

```

```

interface TextTrack : EventTarget {
 ...
 readonly attribute DOMString id;
 readonly attribute DOMString inBandMetadataTrackDispatchType;
 ...
};

```

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `id` and `inBandMetadataTrackDispatchType` attributes are not supported.

V0111: The `addtrack` event handler is defined as a nullable `EventHandler`

The specification states:

```

... Text track API
interface TextTrackList : EventTarget {
 ...
 attribute EventHandler onaddtrack;
 ...
};

```

**IE11 Mode (All versions)**

The `onaddtrack` event handler is defined as a nullable `EventHandler`.

V0109: The `getCueById` function does not return a nullable type

The specification states:

```

... Text track API
...
interface TextTrackCueList {
 ...
 TextTrackCue? getCueById(DOMString id);
};

```

**All document modes (All versions)**

The `getCueById` function does not return a nullable type.

**2.1.45 [HTML5] Section 4.7.10.12.7 Event definitions**

V0112: These `TextTrackList`, `TextTrack`, and `TextTrackCue` event handlers are not supported

The specification states:

4.7.10.12.7 Event definitions

The following are the event handlers that (and their corresponding event handler event types) must be supported, as event handler IDL attributes, by all objects implementing the `TextTrackList` interface:

| Event handler | Event handler event type |
|---------------|--------------------------|
| onchange      | change                   |
| onaddtrack    | addtrack                 |
| onremovetrack | removetrack              |

The following are the event handlers that (and their corresponding event handler event types) must be supported, as event handler IDL attributes, by all objects implementing the `TextTrack` interface:

| Event handler | Event handler event type |
|---------------|--------------------------|
| oncuechange   | cuechange                |

The following are the event handlers that (and their corresponding event handler event types) must be supported, as event handler IDL attributes, by all objects implementing the `TextTrackCue` interface:

| Event handler | Event handler event type |
|---------------|--------------------------|
| onenter       | enter                    |
| onexit        | exit                     |

### **IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

These `TextTrackList`, `TextTrack`, and `TextTrackCue` event handlers are not supported.

#### **V0113: The onaddtrack event handler is not supported**

The specification states:

##### 4.7.10.12.7 Event definitions

The following are the event handlers that (and their corresponding event handler event types) must be supported, as event handler IDL attributes, by all objects implementing the `TextTrackList` interface:

| Event handler | Event handler event type |
|---------------|--------------------------|
| onchange      | change                   |
| onaddtrack    | addtrack                 |
| onremovetrack | removetrack              |

### **IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `onaddtrack` event handler is not supported.

## **2.1.46 [HTML5] Section 4.7.10.14 Time ranges**

V0114: The start and end methods throw an invalid argument exception, not an `IndexSizeError` exception

The specification states:

```
... Time ranges
...
The start(index) method must return the position of the start of the index'th range
```

represented by the object, in seconds measured from the start of the timeline that the object covers.

The end(index) method must return the position of the end of the index'th range represented by the object, in seconds measured from the start of the timeline that the object covers.

These methods must throw `IndexSizeError` exceptions if called with an index argument greater than or equal to the number of ranges represented by the object.

### **All document modes (All versions)**

If called with an index argument greater than or equal to the number of ranges represented by the object, `start` and `end` throw an invalid argument exception, not an `IndexSizeError` exception.

## **2.1.47 [HTML5] Section 4.7.10.15 Event definitions**

V0115: The `TrackEventInit` dictionary is not supported

The specification states:

```
4.7.10.15 Event definitions
...
dictionary TrackEventInit : EventInit {
 (VideoTrack or AudioTrack or TextTrack) track;
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `TrackEventInit` dictionary is not supported.

## **2.1.48 [HTML5] Section 4.7.11 The map element**

V0116: The areas collection is returned as an `HTMLAreasCollection`, not an `HTMLCollection`

The specification states:

```
... The map element
...
interface HTMLMapElement : HTMLElement {
 ...
 ... readonly attribute HTMLCollection areas;
 ...
};
```

### **All document modes (All versions)**

The areas collection is returned as an `HTMLAreasCollection`, not an `HTMLCollection`.

V0117: The images collection is not supported

The specification states:

```
... The map element
...
DOM interface:

 interface HTMLMapElement : HTMLElement {
 ...
 ... readonly attribute HTMLCollection images;
 };
```

### **All document modes (All versions)**

The `images` collection is not supported.

## **2.1.49 [HTML5] Section 4.7.12 The area element**

V0124: If the radius is negative, the absolute value is used

The specification states:

```
... The area element
...
In the circle state, area elements must have a coords attribute present, with three integers, the last of which must be non-negative. The first integer must be the distance in CSS pixels from the left edge of the image to the center of the circle, the second integer must be the distance in CSS pixels from the top edge of the image to the center of the circle, and the third integer must be the radius of the circle, again in CSS pixels.
```

### **All document modes (All versions)**

If the radius is negative, the absolute value is used.

V0120: The `hreflang` attribute is not supported

The specification states:

```
... The area element
...
DOM interface:

 interface HTMLAreaElement : HTMLElement {
 ...
 attribute DOMString hreflang;
 ...
 };
```

### **All document modes (All versions)**

The `hreflang` attribute is not supported.

V0123: The "default" keyword is not supported for the `shape` attribute

The specification states:

```
... The area element
...
The shape attribute is an enumerated attribute. The following table lists the
keywords defined for this attribute. The states given in the first cell of the rows
with keywords give the states to which those keywords map. Some of the keywords are
non-conforming, as noted in the last column.
```

| State           | Keywords  | Notes          |
|-----------------|-----------|----------------|
| Circle state    | circle    |                |
|                 | circ      | Non-conforming |
| Default state   | default   |                |
| Polygon state   | poly      |                |
|                 | polygon   | Non-conforming |
| Rectangle state | rect      |                |
|                 | rectangle | Non-conforming |

### **All document modes (All versions)**

The "default" keyword is not supported for the `shape` attribute.

V0122: The `URLUtils` interface is not implemented for the `HTMLAreaElement` interface

The specification states:

```
4.7.12 The area element
...
interface HTMLAreaElement : HTMLElement {
 ...
};

HTMLAreaElement implements URLUtils;
```

### **All document modes (All versions)**

The `URLUtils` interface is not implemented for the `HTMLAreaElement` interface.

However, some `URLUtils` attributes are implemented on instances of `HTMLAreaElement`. They are:

```
href
protocol
host
hostname
port
pathname
search
hash
```

These are not implemented:

```
username
```

password  
searchParams  
origin

V0125: For the polygon state, fewer than 6 integers can be provided

The specification states:

```
... The area element
...
In the polygon state, area elements must have a coords attribute with at least six
integers, and the number of integers must be even. Each pair of integers must
represent a coordinate given as the distances from the left and the top of the image
in CSS pixels respectively, and all the coordinates together must represent the
points of the polygon, in order.
```

### **All document modes (All versions)**

For the polygon state, fewer than 6 integers can be provided. If so, the missing integers are taken to be 0.

V0126: For the rectangle state, fewer than four integers can be provided

The specification states:

```
... The area element
...
In the rectangle state, area elements must have a coords attribute with exactly four
integers, the first of which must be less than the third, and the second of which
must be less than the fourth. The four points must represent, respectively, the
distance from the left edge of the image to the left side of the rectangle, the
distance from the top edge to the top side, the distance from the left edge to the
right side, and the distance from the top edge to the bottom side, all in CSS pixels.
```

### **All document modes (All versions)**

For the rectangle state, fewer than four integers can be provided. If so, the missing integers are taken to be 0.

V0121: The type attribute is not supported

The specification states:

```
... The area element
...
DOM interface:

 interface HTMLAreaElement : HTMLElement {
 ...
 attribute DOMString type;
 ...
 };
```

### **All document modes (All versions)**

The `type` attribute is not supported.

V0119: The `download` attribute is not supported

The specification states:

```
4.7.12 The area element
...
interface HTMLAreaElement : HTMLElement {
 ...
 attribute DOMString download;
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `download` attribute is not supported.

## **2.1.50 [HTML5] Section 4.7.13.2 Processing model**

V0127: If an image does not load, a valid image map will still be applied to the missing image, and not in a way that associates the image with the text

The specification states:

```
... Processing model
...
If the user agent intends to show the text that the img element represents, then it
must use the following steps.
...
3. Each remaining area element in areas represents a hyperlink. Those hyperlinks
should all be made available to the user in a manner associated with the text
of the img.
```

### **All document modes (All versions)**

If an image does not load, a valid image map will still be applied to the missing image, and not in a way that associates the image with the text.

V0128: The `usemap` attribute does not do a case-sensitive match for the appropriate image map

The specification states:

```
... Processing model

If an img element ... has a usemap attribute specified, user agents must process it
as follows:
```

### **All document modes (All versions)**

The `usemap` attribute does not do a case-sensitive match for the appropriate image map.

### **2.1.51 [HTML5] Section 4.7.14 MathML**

V0129: The `math` element is not supported

The specification states:

... MathML

The [MathML math element/math element from the MathML namespace] falls into the embedded content, phrasing content, ... flow content ... categories for the purposes of the content models in this specification.

#### ***All document modes (All versions)***

The `math` element is not supported.

### **2.1.52 [HTML5] Section 4.8.3 Downloading resources**

V0130: The `download` attribute is not supported

The specification states:

4.8.3 Downloading resources

In some cases, resources are intended for later use rather than immediate viewing. To indicate that a resource is intended to be downloaded for use later, rather than immediately used, the `download` attribute can be specified on the `a` or `area` element that creates the hyperlink to that resource.

#### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

The `download` attribute is not supported.

### **2.1.53 [HTML5] Section 4.8.4.9 Link type "prefetch"**

V0131: The `prefetch` link type is not supported for the `a` and `area` elements

The specification states:

4.8.4.9 Link type "prefetch"

The `prefetch` keyword may be used with `link`, `a`, and `area` elements. This keyword creates an external resource link.

The `prefetch` keyword indicates that preemptively fetching and caching the specified resource is likely to be beneficial, as it is highly likely that the user will require this resource.

## **All document modes (All versions)**

The `prefetch` link type is not supported for the `a` and `area` elements.

### **2.1.54 [HTML5] Section 4.9.1 The table element**

V0132: The `insertRow` function incorrectly inserts new rows

The specification states:

#### 4.9.1 The table element

...

The behavior of the `insertRow(index)` method depends on the state of the table. When it is called, the method must act as required by the first item in the following list of conditions that describes the state of the table and the `index` argument:

If `index` is less than `-1` or greater than the number of elements in `rows` collection:

The method must throw an `IndexSizeError` exception.

If the `rows` collection has zero elements in it, and the table has no `tbody` elements in it:

The method must create a `tbody` element, then create a `tr` element, then append the `tr` element to the `tbody` element, then append the `tbody` element to the table element, and finally return the `tr` element.

If the `rows` collection has zero elements in it:

The method must create a `tr` element, append it to the last `tbody` element in the table, and return the `tr` element.

If `index` is `-1` or equal to the number of items in `rows` collection:

The method must create a `tr` element, and append it to the parent of the last `tr` element in the `rows` collection. Then, the newly created `tr` element must be returned.

Otherwise:

The method must create a `tr` element, insert it immediately before the `indexth` `tr` element in the `rows` collection, in the same parent, and finally must return the newly created `tr` element.

## **IE11 Mode, IE10 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `insertRow` function incorrectly inserts new rows:

- When the `<table>` is empty, a `<tbody>` will be created.
- When the `<table>` contains only a `<thead>`, `insertRow` will add a new `<tr>` to the `<thead>` - a `<tbody>` is not added.
- When the `<table>` contains a `<tfoot>`, `insertRow` will add a new `<tr>` to the `<tfoot>` - a `<tbody>` is not added.

## 2.1.55 [HTML5] Section 4.9.5 The tbody element

V0134: The deleteRow function deletes the last row if index is -1

The specification states:

```
4.9.5 The tbody element
...
The deleteRow(index) method must remove the index'th element in the rows collection
from its parent. If index is less than zero or greater than or equal to the number of
elements in the rows collection, the method must instead throw an IndexSizeError
exception.
```

### **All document modes (All versions)**

The deleteRow function deletes the last row if index is -1.

V0133: The deleteRow function does not require the index value

The specification states:

```
4.9.5 The tbody element
...
DOM interface:

interface HTMLTableSectionElement : HTMLElement {
 ...
 void deleteRow(long index);
};
```

### **All document modes (All versions)**

The deleteRow function does not require the index value.

## 2.1.56 [HTML5] Section 4.9.8 The tr element

V0135: The deleteCell method does not require the index argument

The specification states:

```
4.9.8 The tr element
...
DOM interface:

interface HTMLTableRowElement : HTMLElement {
 ...
 void deleteCell(long index);
};
```

### **All document modes (All versions)**

The deleteCell method does not require the index argument.

V0136: If index is -1, the deleteCell method deletes the last cell of the row

The specification states:

```
4.9.8 The tr element
...
The deleteCell(index) method must remove the index'th element in the cells collection
from its parent. If index is less than zero or greater than or equal to the number of
elements in the cells collection, the method must instead throw an IndexSizeError
exception.
```

### **All document modes (All versions)**

If index is -1, the deleteCell method deletes the last cell of the row.

## **2.1.57 [HTML5] Section 4.9.10 The th element**

V0137: The abbr attribute is not defined directly on the HTMLTableHeaderCellElement interface

The specification states:

```
4.9.10 The th element
...
DOM interface:

 interface HTMLTableHeaderCellElement : HTMLTableCellElement {
 ...
 attribute DOMString abbr;
 };
```

### **All document modes (All versions)**

The abbr attribute is not defined directly on the HTMLTableHeaderCellElement interface. Instead, it is abstracted to the base class HTMLTableCellElement.

## **2.1.58 [HTML5] Section 4.9.11 Attributes common to td and th elements**

V0138: The headers attribute is not supported

The specification states:

```
4.9.11 Attributes common to td and th elements
...
interface HTMLTableCellElement : HTMLElement {
 ...
 [PutForwards=value] readonly attribute DOMSettableTokenList headers;
 ...
};
```

### **All document modes (Internet Explorer 11, Internet Explorer 10, Internet Explorer 9, and Internet Explorer 8)**

The headers attribute is not supported.

## 2.1.59 [HTML5] Section 4.9.12.2 Forming relationships between data cells and header cells

V0139: The headers attribute is not supported

The specification states:

```
4.9.12.2 Forming relationships between data cells and header cells
```

### **All document modes (Internet Explorer 11, Internet Explorer 10, Internet Explorer 9, and Internet Explorer 8)**

The headers attribute is not supported.

## 2.1.60 [HTML5] Section 4.10.3 The form element

V0140: The novalidate attribute is not supported

The specification states:

```
4.10.3 The form element
...
[OverrideBuiltins]
interface HTMLFormElement : HTMLElement {
 ...
 attribute boolean noValidate;
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The novalidate attribute is not supported.

V0141: The elements collection is of type HTMLCollection, not HTMLFormControlsCollection

The specification states:

```
4.10.3 The form element
...
[OverrideBuiltins]
interface HTMLFormElement : HTMLElement {
 ...
 readonly attribute HTMLFormControlsCollection elements;
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The elements attribute is of type HTMLCollection, not HTMLFormControlsCollection.

## 2.1.61 [HTML5] Section 4.10.5 The input element

V0146: The dirName attribute is not supported

The specification states:

```
4.10.5 The input element
...
DOM interface:

 interface HTMLInputElement : HTMLElement {
 ...
 attribute DOMString dirName;
 ...
 };
```

### **All document modes (All versions)**

The dirName attribute is not supported.

V0145: The selection interface objects are defined, but selection does not occur on any input controls when called from script

The specification states:

```
4.10.5 The input element
...
DOM interface:

 interface HTMLInputElement : HTMLElement {
 ...
 void select();
 attribute unsigned long selectionStart;
 attribute unsigned long selectionEnd;
 attribute DOMString selectionDirection;
 void setRangeText(DOMString replacement);
 void setRangeText(DOMString replacement, unsigned long start, unsigned long
end, ...
 void setSelectionRange(unsigned long start, unsigned long end, optional
DOMString direction);
 };
```

### **All document modes (All versions)**

The selection interface objects are defined, but selection does not occur on any input controls when called from script.

V0149: The setRangeText functions are not supported

The specification states:

```
4.10.5 The input element
...
DOM interface:
```

```
interface HTMLInputElement : HTMLElement {
 ...
 void setRangeText(DOMString replacement);
 void setRangeText(DOMString replacement, unsigned long start, unsigned long
end, ...
 ...
};
```

### **All document modes (All versions)**

The `setRangeText` functions are not supported.

V0143: The `valueAsDate` attribute is not supported

The specification states:

```
4.10.5 The input element
...
interface HTMLInputElement : HTMLElement {
 ...
 attribute Date? valueAsDate;
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `valueAsDate` attribute is not supported.

V0144: The value sanitization algorithm is not invoked when the input type attribute changes state

The specification states:

```
4.10.5 The input element
...
When an input element's type attribute changes state, the user agent must run the
following steps:
...
... Invoke the value sanitization algorithm, if one is defined for the type
attribute's new state.
```

### **All document modes (All versions)**

The value sanitization algorithm is not invoked when the input type attribute changes state (e.g. from hidden to text).

## **2.1.62 [HTML5] Section 4.10.5.1.1 Hidden state (type=hidden)**

V0150: The `files` attribute returns undefined, not null

The specification states:

4.10.5.1.1 Hidden state (type=hidden)

...  
Bookkeeping details  
...  
▪ The following IDL attributes and methods do not apply to the element: checked, files, list, selectionStart, selectionEnd, selectionDirection, valueAsDate, and valueAsNumber IDL attributes; select(), setRangeText(), setSelectionRange(), stepDown(), and stepUp() methods.

### **All document modes (All versions)**

The files attribute returns undefined, not null.

## **2.1.63 [HTML5] Section 4.10.5.1.4 URL state (type=url)**

V0151: Value sanitization does not strip leading and trailing whitespace from a URL

The specification states:

4.10.5.1.4 URL state (type=url)  
...  
The value sanitization algorithm is as follows: Strip line breaks from the value, then strip leading and trailing whitespace from the value.

### **All document modes (All versions)**

Value sanitization does not strip leading and trailing whitespace from a URL.

## **2.1.64 [HTML5] Section 4.10.5.1.5 E-mail state (type=email)**

V0152: The value sanitization algorithm is not run when the multiple attribute is removed

The specification states:

4.10.5.1.5 E-mail state (type=email)  
...  
How the E-mail state operates depends on whether the multiple attribute is specified or not.  
  
When the multiple attribute is not specified on the element  
...  
When the multiple attribute is removed, the user agent must run the value sanitization algorithm.

### **All document modes (All versions)**

The value sanitization algorithm is not run when the multiple attribute is removed.

V0153: Email addresses are not properly validated when the multiple attribute is specified

The specification states:

#### 4.10.5.1.5 E-mail state (type=email)

...

How the E-mail state operates depends on whether the `multiple` attribute is specified or not.

...

When the `multiple` attribute is specified on the element

...

Constraint validation: While the user interface describes a situation where an individual value contains a "," (U+002C) or is representing input that the user agent cannot convert to punycode, the control is suffering from bad input.

Whenever the user changes the element's values, the user agent must run the following steps:

Let latest values be a copy of the element's values.

Strip leading and trailing whitespace from each value in latest values.

Let the element's value be the result of concatenating all the values in latest values, separating each value from the next by a single "," (U+002C) character, maintaining the list's order.

The value attribute, if specified, must have a value that is a valid e-mail address list.

The value sanitization algorithm is as follows:

Split on commas the element's value, strip leading and trailing whitespace from each resulting token, if any, and let the element's values be the (possibly empty) resulting list of (possibly empty) tokens, maintaining the original order.

Let the element's value be the result of concatenating the element's values, separating each value from the next by a single "," (U+002C) character, maintaining the list's order.

When the `multiple` attribute is set, the user agent must run the value sanitization algorithm.

Constraint validation: While the value of the element is not a valid e-mail address list, the element is suffering from a type mismatch.

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

Email addresses are not properly validated when the `multiple` attribute is specified and there are multiple email addresses, each separated from the next by a single "," (U+002C) character.

## **2.1.65 [HTML5] Section 4.10.5.1.7 Date state (type=date)**

V0154: The Date state is not supported

The specification states:

#### 4.10.5.1.7 Date state (type=date)

...

When an input element's `type` attribute is in the Date state, the rules in this section apply.

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The Date state is not supported.

**2.1.66 [HTML5] Section 4.10.5.1.8 Time state (type=time)**

V0155: The Time state is not supported

The specification states:

```
4.10.5.1.8 Time state (type=time)
...
When an input element's type attribute is in the Time state, the rules in this
section apply.
```

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The Time state is not supported.

**2.1.67 [HTML5] Section 4.10.5.1.9 Number state (type=number)**

V0156: White space in floating-point number values is treated as invalid

The specification states:

```
... Number state (type=number)
...
If the element is mutable, the user agent should allow the user to change the number
represented by its value, as obtained from applying the rules for parsing
floating-point number values to it. ...
```

**All document modes (All versions)**

White space in floating-point number values is treated as invalid; it should be ignored.

**2.1.68 [HTML5] Section 4.10.5.1.10 Range state (type=range)**

V0158: The default value for the min and max attributes is the empty string ("")

The specification states:

```
... Range state (type=range)
...
The min attribute, if specified, must have a value that is a valid floating-point
number. The default minimum is 0. The max attribute, if specified, must have a value
that is a valid floating-point number. The default maximum is 100.
```

**All document modes (All versions)**

The default value for the `min` and `max` attributes is the empty string ("").

V0159: The default step is incorrect if a non-integer value is specified for the `min` attribute

The specification states:

```
... Range state (type=range)
...
The step scale factor is 1. The default step is 1 (allowing only integers, unless the
min attribute has a non-integer value).
```

### **All document modes (All versions)**

The default step is incorrect if a non-integer value is specified for the `min` attribute.

V0157: The `min` and `max` attributes allow invalid values to be specified (e.g. "AA")

The specification states:

```
... Range state (type=range)
...
The min attribute, if specified, must have a value that is a valid floating-point
number. The default minimum is 0. The max attribute, if specified, must have a value
that is a valid floating-point number. The default maximum is 100.
```

### **All document modes (All versions)**

The `min` and `max` attributes allow invalid values to be specified (e.g. "AA").

## **2.1.69 [HTML5] Section 4.10.5.1.11 Color state (type=color)**

V0160: The Color state is not supported

The specification states:

```
4.10.5.1.11 Color state (type=color)
...
When an input element's type attribute is in the Color state, the rules in this
section apply.
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `Color` state is not supported.

## **2.1.70 [HTML5] Section 4.10.5.1.12 Checkbox state (type=checkbox)**

V0163: The `validityState` `valueMissing` returns false when it is required and `checkedness` is false

The specification states:

```
4.10.5.1.12 Checkbox state (type=checkbox)
...
Constraint validation: If the element is required and its checkedness is false, then
the element is suffering from being missing.
```

### **All document modes (All versions)**

The `validityState` `valueMissing` returns false when it is required and checkedness is false.

V0161: The `oninput` event does not fire when the state of the checkbox is changed or when the `click` function is called

The specification states:

```
... Checkbox state (type=checkbox)
...
Bookkeeping details
...
 ■ The input and change events apply.
```

### **All document modes (All versions)**

The `oninput` event does not fire when the state of the checkbox is changed or when the `click` function is called.

V0162: The checked state does not change when the check function is called

The specification states:

```
... Checkbox state (type=checkbox)
...
If the element is mutable, then: The pre-click activation steps consist of setting
the element's checkedness to its opposite value (i.e. true if it is false, false if
it is true), and of setting the element's indeterminate IDL attribute to false. The
canceled activation steps consist of setting the checkedness and the element's
indeterminate IDL attribute back to the values they had before the pre-click
activation steps were run. The activation behavior is to fire a simple event that
bubbles named input at the element and then fire a simple event that bubbles named
change at the element.
```

### **All document modes (All versions)**

The `checked` state does not change when the `check` function is called.

## **2.1.71 [HTML5] Section 4.10.5.1.13 Radio Button state (type=radio)**

V0166: The comparison of the name attributes is not done in a compatibility caseless manner for all Unicode ranges.

The specification states:

```
... Radio Button state (type=radio)
...
The radio button group that contains an input element a also contains all the other
input elements b that fulfill all of the following conditions:
...
• They both have a name attribute, their name attributes are not empty, and the
value of a's name attribute is a compatibility caseless match for the value of
b's name attribute.
```

### **All document modes (All versions)**

The comparison of the `name` attributes is not done in a compatibility caseless manner for all Unicode ranges; instead the comparison uses ASCII comparison.

V0165: The `preventDefault` function does not properly cancel events

The specification states:

```
4.10.5.1.13 Radio Button state (type=radio)
...
If the element is mutable, then: The pre-click activation steps consist of setting
the element's checkedness to true. The canceled activation steps consist of setting
the element's checkedness to false. The activation behavior is to fire a simple event
that bubbles named input at the element and then fire a simple event that bubbles
named change at the element.
```

### **All document modes (All versions)**

The `preventDefault` function does not cancel events.

V0168: When there are no checked elements, the checkedness values are set to false

The specification states:

```
... Radio Button state (type=radio)
...
Constraint validation: If an element in the radio button group is required, and all
of the input elements in the radio button group have a checkedness that is false,
then the element is suffering from being missing.

Note: If none of the radio buttons in a radio button group are checked when they
are inserted into the document, then they will all be initially unchecked in the
interface, until such time as one of them is checked (either by the user or by
script).
```

### **All document modes (All versions)**

An input `type=radio` when part of a radio group that has no other checked elements within it, is considered, with all of the other radio group elements, to be in the intermediate state and all elements' checkedness values are set to false.

V0167: The `valueMissing` attribute returns false when an element is required and checkedness is false

The specification states:

4.10.5.1.13 Radio Button state (type=radio)

...  
Constraint validation: If an element in the radio button group is required, and all of the input elements in the radio button group have a checkedness that is false, then the element is suffering from being missing.

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `valueMissing` attribute of the `ValidityState` interface returns false when an input element is required and when `checkedness` is false for all input elements.

V0164: The `oninput` event does not fire if the state of the radio option is changed or the click function is called

The specification states:

```
... Radio Button state (type=radio)
...
Bookkeeping details
...
 • The input and change events apply.
```

### **All document modes (All versions)**

The `oninput` event does not fire if the state of the radio option is changed or the `click` function is called.

## **2.1.72 [HTML5] Section 4.10.5.1.14 File Upload state (type=file)**

V0169: The file type does not properly secure the selected file

The specification states:

```
... File Upload state (type=file)
...
Example 485

For historical reasons, the value IDL attribute prefixes the file name with the string "C:\fakepath\". Some legacy user agents actually included the full path (which was a security vulnerability).
```

### **All document modes (All versions)**

The input `type=file` does not properly secure the selected file nor obscure the local file location. It obscures the file when it is submitted to the server.

## **2.1.73 [HTML5] Section 4.10.5.1.17 Reset Button state (type=reset)**

V0170: Form controls linked using the `form` attribute are not reset

The specification states:

```
... Reset Button state (type=reset)
...
If the element is mutable, then the element's activation behavior, if the element has
a form owner and the element's Document is fully active, is to reset the form owner;
otherwise, it is to do nothing.
```

### **All document modes (All versions)**

Form controls linked using the `form` attribute are not reset.

## **2.1.74 [HTML5] Section 4.10.6 The button element**

V0171: The `labels` attribute is not supported

The specification states:

```
4.10.6 The button element
...
interface HTMLButtonElement : HTMLElement {
 ...
 ... readonly attribute NodeList labels;
};
```

### **All document modes (All versions)**

The `labels` attribute is not supported.

## **2.1.75 [HTML5] Section 4.10.7 The select element**

V0175: The `namedItem` function throws an exception when it receives an empty string

The specification states:

```
4.10.7 The select element
...
DOM interface:

interface HTMLSelectElement : HTMLElement {
 ...
 HTMLOptionElement? namedItem(DOMString name);
 ...
};
```

### **All document modes (All versions)**

The `namedItem` function throws an exception when it receives an empty string; it should return null.

V0174: The `selectedOptions` collection is not supported

The specification states:

4.10.7 The select element

```
...
interface HTMLSelectElement : HTMLElement {
 ...
 readonly attribute HTMLCollection selectedOptions;
 ...
};
```

**All document modes (Internet Explorer 11, Internet Explorer 10, Internet Explorer 9, and Internet Explorer 8)**

The `selectedOptions` collection is not supported.

V0172: The options collection returns an `HTMLSelectElement`, not an `HTMLOptionsCollection`

The specification states:

4.10.7 The select element

```
...
interface HTMLSelectElement : HTMLElement {
 ...
 readonly attribute HTMLOptionsCollection options;
 ...
};
```

**All document modes (Internet Explorer 11, Internet Explorer 10, Internet Explorer 9, and Internet Explorer 8)**

The `options` collection returns an `HTMLSelectElement`, not an `HTMLOptionsCollection`.

V0176: The `namedItem` function does not select options based on the `name` attribute

The specification states:

4.10.7 The select element

```
...
The namedItem(name) method must return the value returned by the method of the same
name on the options collection, when invoked with the same argument.
```

**All document modes (Internet Explorer 11, Internet Explorer 10, Internet Explorer 9, and Internet Explorer 8)**

The `namedItem` function does not select options based on the `name` attribute.

## 2.1.76 [HTML5] Section 4.10.10 The option element

V0177: The text of nested SVG script elements is included in the returned value

The specification states:

```
4.10.10 The option element
...
```

The text IDL attribute, on getting, must return the result of stripping and collapsing whitespace from the [child text content/concatenation of data of all the Text node descendants] of the option element, in tree order, excluding any that are descendants of descendants of the option element that are themselves script elements in the HTML namespace or script elements in the SVG namespace.

### **All document modes (All versions)**

The text of nested SVG script elements is included in the returned value.

## **2.1.77 [HTML5] Section 4.10.11 The textarea element**

V0180: The autocomplete attribute is not supported

The specification states:

```
4.10.11 The textarea element
...
DOM interface:

 interface HTMLTextAreaElement : HTMLElement {
 attribute DOMString autocomplete;
 ...
 };
```

### **All document modes (All versions)**

The autocomplete attribute is not supported.

V0181: The dirName attribute is not supported

The specification states:

```
4.10.11 The textarea element
...
DOM interface:

 interface HTMLTextAreaElement : HTMLElement {
 ...
 attribute DOMString dirName;
 ...
 };
```

### **All document modes (All versions)**

The dirName attribute is not supported.

## **2.1.78 [HTML5] Section 4.10.12 The keygen element**

V0183: The keygen element is not supported

The specification states:

4.10.12 The keygen element

...

The keygen element represents a key pair generator control. When the control's form is submitted, the private key is stored in the local keystore, and the public key is packaged and sent to the server.

**All document modes (All versions)**

The keygen element is not supported.

**2.1.79 [HTML5] Section 4.10.13 The output element**

V0184: The output element is not supported

The specification states:

4.10.13 The output element

...

The output element represents the result of a calculation or user action.

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The output element is not supported.

**2.1.80 [HTML5] Section 4.10.15 The meter element**

V0186: The meter element is not supported

The specification states:

4.10.15 The meter element

...

The meter element represents a scalar measurement within a known range, or a fractional value; for example disk usage, the relevance of a query result, or the fraction of a voting population to have selected a particular candidate.

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The meter element is not supported.

**2.1.81 [HTML5] Section 4.10.16 The fieldset element**

V0189: The elements collection is not supported

The specification states:

4.10.16 The fieldset element

...

```
interface HTMLFieldSetElement : HTMLElement {
 ...
 readonly attribute HTMLFormControlsCollection elements;
 ...
};
```

### **All document modes (All versions)**

The `elements` collection is not supported.

## **2.1.82 [HTML5] Section 4.10.18.3 Association of controls and forms**

V0190: The `form` attribute cannot be used to override the nearest ancestor form element

The specification states:

```
... Association of controls and forms
...
A form-associated element is, by default, associated with its nearest ancestor form
element (as described below), but, if it is reassociateable, may have a form
attribute specified to override this.
```

### **All document modes (All versions)**

The `form` attribute cannot be used to override the nearest ancestor form element.

## **2.1.83 [HTML5] Section 4.10.19.2 Submitting element directionality: the `dirname` attribute**

V0191: The `dirname` attribute is not supported

The specification states:

```
... Submitting element directionality: the dirname attribute

The dirname attribute on a form control element enables the submission of the
directionality of the element, and gives the name of the field that contains this
value during form submission. If such an attribute is specified, its value must not
be the empty string.
```

### **All document modes (All versions)**

The `dirname` attribute is not supported.

## **2.1.84 [HTML5] Section 4.10.19.7 Autofocusing a form control: the `autofocus` attribute**

V0193: The `autofocus` attribute does not always correctly focus on the correct control

The specification states:

#### 4.10.19.7 Autofocusing a form control: the autofocus attribute

The autofocus content attribute allows the author to indicate that a control is to be focused as soon as the page is loaded, allowing the user to just start typing without having to manually focus the main control.

### **IE11 Mode, IE10 Mode, IE9 Mode, and IE8 Mode (Internet Explorer 11, Internet Explorer 10, Internet Explorer 9, and Internet Explorer 8)**

The autofocus attribute does not always correctly focus on the correct control.

## **2.1.85 [HTML5] Section 4.10.20 APIs for the text field selections**

V0195: The setRangeText functions are not supported

The specification states:

... APIs for the text field selections

The input and textarea elements define the following members in their DOM interfaces for handling their selection: ... setRangeText(replacement) ...

### **All document modes (All versions)**

The setRangeText functions are not supported.

V0194: The selectionDirection attribute is not supported

The specification states:

4.10.20 APIs for the text field selections

The input and textarea elements define the following members in their DOM interfaces for handling their selection:

...  
attribute DOMString selectionDirection;

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The selectionDirection attribute is not supported.

## **2.1.86 [HTML5] Section 4.10.21.1 Definitions**

V0196: The setCustomValidity function is not supported

The specification states:

4.10.21.1 Definitions

...  
An element can have a custom validity error message defined. Initially, an element

must have its custom validity error message set to the empty string. When its value is not the empty string, the element is suffering from a custom error. It can be set using the `setCustomValidity()` method. ...

### **IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `setCustomValidity` function is not supported.

## **2.1.87 [HTML5] Section 4.10.21.2 Constraint validation**

V0197: No list of elements is returned

The specification states:

... Constraint validation

When the user agent is required to statically validate the constraints of form element form, it must run the following steps, which return either a positive result (all the controls in the form are valid) or a negative result (there are invalid controls) along with a (possibly empty) list of elements that are invalid and for which no script has claimed responsibility:

- ...
7. Return a negative result with the list of elements in the unhandled invalid controls list.

### **All document modes (All versions)**

No list of elements is returned.

V0198: Constraint validation is not supported

The specification states:

4.10.21.2 Constraint validation

...  
If a user agent is to interactively validate the constraints of form element form, then the user agent must run the following steps:

- ...
3. Report the problems with the constraints of at least one of the elements given in unhandled invalid controls to the user. User agents may focus one of those elements in the process, by running the focusing steps for that element, and may change the scrolling position of the document, or perform some other action that brings the element to the user's attention. User agents may report more than one constraint violation. User agents may coalesce related constraint violation reports if appropriate (e.g. if multiple radio buttons in a group are marked as required, only one error need be reported). If one of the controls is not being rendered (e.g. it has the hidden attribute set) then user agents may report a script error.

### **IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

Constraint validation is not supported.

## 2.1.88 [HTML5] Section 4.10.21.3 The constraint validation API

V0200: The validity attribute is not supported

The specification states:

```
4.10.21.3 The constraint validation API
...
The validity attribute must return a ValidityState object that represents the
validity states of the element. This object is live, and the same object must be
returned each time the element's validity attribute is retrieved.
```

### **IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The validity attribute is not supported.

V0203: The badInput attribute is not supported

The specification states:

```
4.10.21.3 The constraint validation API
...
interface ValidityState {
...
 readonly attribute boolean badInput;
...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The badInput attribute is not supported.

V0201: The setCustomValidity function is not supported

The specification states:

```
4.10.21.3 The constraint validation API
...
The setCustomValidity(message), when invoked, must set the custom validity error
message to the value of the given message argument.
```

### **IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The setCustomValidity function is not supported.

V0202: The tooLong attribute returns true when the maxlength value is not set

The specification states:

```
4.10.21.3 The constraint validation API
...
A ValidityState object has the following attributes. On getting, they must return
```

```
true if the corresponding condition given in the following list is true, and false
otherwise.
...
tooLong
 The control is suffering from being too long.
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `tooLong` attribute returns true when the `maxLength` value is not set.

### **2.1.89 [HTML5] Section 4.10.22.5 Selecting a form submission encoding**

V0204: UTF-8 is used in form submission even if `accept-charset` contains other encodings that can encode the entire form data set

The specification states:

```
... Selecting a form submission encoding
 If the user agent is to pick an encoding for a form ...
```

#### **All document modes (All versions)**

UTF-8 is used in form submission even if `accept-charset` contains other encodings that can encode the entire form data set.

### **2.1.90 [HTML5] Section 4.10.22.6 URL-encoded form data**

V0205: URL-encoded form data is encoded in UTF-8 regardless of what is in `accept-charset`

The specification states:

```
... URL-encoded form data
...
The application/x-www-form-urlencoded encoding algorithm is as follows:
```

#### **All document modes (All versions)**

URL-encoded form data is encoded in UTF-8 regardless of what is in `accept-charset`.

V0206: URL-encoded form data includes the full filepath for type `file`, not the file name alone

The specification states:

```
... URL-encoded form data
...
The application/x-www-form-urlencoded encoding algorithm is as follows:
```

#### **All document modes (All versions)**

URL-encoded form data includes the full file path for type `file`, not the file name alone.

### 2.1.91 [HTML5] Section 4.10.22.7 Multipart form data

V0207: Forms are always encoded as UTF-8

The specification states:

```
... Multipart form data

The multipart/form-data encoding algorithm is as follows:
...
2. If the algorithm was invoked with an explicit character encoding, let the
 selected character encoding be that encoding. ...
...
 Otherwise, let the selected character encoding be UTF-8.
```

#### **All document modes (All versions)**

Forms are always encoded as UTF-8.

### 2.1.92 [HTML5] Section 4.10.22.8 Plain text form data

V0208: The submitted data set includes the full path of the file, not just the filename

The specification states:

```
... Plain text form data

The text/plain encoding algorithm is as follows:
...
5. If the entry's type is "file", replace its value with the file's name only.
```

#### **All document modes (All versions)**

The submitted data set includes the full path of the file, not just the filename.

### 2.1.93 [HTML5] Section 4.11.1 The script element

V0212: If the `for` attribute is not "window", or the event attribute is not "onload", the script is still executed

The specification states:

```
... ..
... ..
To prepare a script, the user agent must act as follows:
...
12. If the script element has an event attribute and a for attribute, ... then
 run these substeps:
 ...
4. If for is not an ASCII case-insensitive match for the string "window",
 then the user agent must abort these steps at this point. The script is
```

not executed.

5. If event is not an ASCII case-insensitive match for either the string "onload" or the string "onload()", then the user agent must abort these steps at this point. The script is not executed.

### **All document modes (All versions)**

If the `for` attribute is not "window", or the `event` attribute is not "onload", the script is still executed.

V0209: The `crossOrigin` attribute is not supported

The specification states:

```
4.11.1 The script element
...
interface HTMLScriptElement : HTMLElement {
 ...
 attribute DOMString crossOrigin;
 ...
};
```

### **IE11 Mode, IE10 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `crossOrigin` attribute is not supported.

V0213: The `beforescriptexecute` and `afterscriptexecute` events were removed from the HTML5 standard, but this section still references them

The specification states:

```
4.11.1 The script element
...
When the user agent is required to execute a script block, it must run the following
steps:
...
2. Jump to the appropriate set of steps from the list below:
...
 If the load was successful

 Executing the script block must consist of running the following
 steps. ...
 ...
 2. Fire a simple event named beforescriptexecute that bubbles
 and is cancelable at the script element.
 ...
 6. Fire a simple event named afterscriptexecute that bubbles
 (but is not cancelable) at the script element.
```

### **All document modes (All versions)**

The `beforescriptexecute` and `afterscriptexecute` events were removed from the HTML5 standard, but this section still references them.

V0211: If the type attribute is an empty string value, it is not defaulted to text/javascript and JavaScript execution fails

The specification states:

```
... ...
...
To prepare a script, the user agent must act as follows:
...
6. If either:
 o the script element has a type attribute and its value is the empty
 string, or
 o the script element has no type attribute but it has a language attribute
 and that attribute's value is the empty string, or
 o the script element has neither a type attribute nor a language attribute,
 then
... let the script block's type for this script element be "text/javascript".
```

### **All document modes (All versions)**

If the type attribute is an empty string value, it is not defaulted to text/javascript and JavaScript execution fails.

V0210: The async attribute is not supported

The specification states:

```
4.11.1 The script element
...
interface HTMLScriptElement : HTMLElement {
 ...
 attribute boolean async;
 ...
};
```

### **IE9 Mode and IE8 Mode (All versions)**

The async attribute is not supported.

## **2.1.94 [HTML5] Section 4.11.1.1 Scripting languages**

V0214: Some MIME types are not recognized

The specification states:

```
4.11.1.1 Scripting languages
...
The following lists the MIME type strings that user agents must recognize, and the
languages to which they refer:
 "application/x-ecmascript"
 ...
 "text/javascript1.0"
```

```
...
"text/javascript1.4"
"text/javascript1.5"
...
"text/x-ecmascript"
```

### **All document modes (All versions)**

The following MIME types are not recognized:

```
"application/x-ecmascript"
"text/javascript1.0"
"text/javascript1.4"
"text/javascript1.5"
"text/x-ecmascript"
```

V0215: Script language type recognition is based on the type/language attribute

The specification states:

```
... Scripting languages
...
When examining types to determine if they represent supported languages, user agents
must not ignore MIME parameters. Types are to be compared including all parameters.
```

### **All document modes (All versions)**

Determination on whether a script is represented in a supported language is based on the type/language attribute. The attribute is validated against a list of recognized script types.

## **2.1.95 [HTML5] Section 4.11.3 The template element**

V0216: The template element is not supported

The specification states:

```
4.11.3 The template element
...
The template element is used to declare fragments of HTML that can be cloned and
inserted in the document by script.
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The template element is not supported.

## 2.1.96 [HTML5] Section 4.11.4 The canvas element

V0217: The toBlob function is not supported

The specification states:

```
4.11.4 The canvas element
...
void toBlob(FileCallback? _callback, optional DOMString type, any... arguments);
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The toBlob function is not supported.

V0219: The width and height content attribute values truncate the content and do not return the value for getAttribute

The specification states:

```
... The canvas element
...
Whenever the width and height content attributes are set, removed, changed, or
redundantly set to the value they already have, if the canvas context mode is ... 2d,
the user agent must set bitmap dimensions to the numeric values of the width and
height content attributes.
```

The width and height IDL attributes must reflect the respective content attributes of the same name, with the same defaults.

### **All document modes (All versions)**

The width and height content attribute values truncate the content and do not return the value for getAttribute.

V0218: The null character \0 is not properly handled by the getContext function

The specification states:

```
4.11.4 The canvas element
...
The getContext(contextId, arguments...) method of the canvas element, when invoked,
must run the steps in the cell of the following table whose column header describes
the canvas element's canvas context mode and whose row header describes the method's
first argument.
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The null character \0 is not properly handled by the getContext function.

## 2.1.97 [HTML5] Section 4.11.4.2 Serializing bitmaps to a file

V0220: Setting the JPEG quality to an invalid value does not cause the default value to be used

The specification states:

```
... Serializing bitmaps to a file
...
Arguments for serialization methods [table]

Other arguments [column]

The second argument, if it is a number in the range 0.0 to 1.0 inclusive,
must be treated as the desired quality level. If it is not a number or is
outside that range, the user agent must use its default value, as if the
argument had been omitted.
```

### **All document modes (All versions)**

Setting the JPEG quality to an invalid value does not cause the default value to be used.

## 2.1.98 [HTML5] Section 4.14.2 Pseudo-classes

V0222: The :enabled state incorrectly identifies link elements that have no href attribute as enabled

The specification states:

```
4.14.2 Pseudo-classes
...
:enabled

The :enabled pseudo-class must match any element falling into one of the
following categories:
...
link elements that have an href attribute
```

### **All document modes (All versions)**

The :enabled state incorrectly identifies link elements that have no href attribute as enabled.

V0223: The :enabled state does not identify a or area elements with href attributes as enabled

The specification states:

```
4.14.2 Pseudo-classes
...
:enabled

The :enabled pseudo-class must match any element falling into one of the
following categories:
...
a elements that have an href attribute

area elements that have an href attribute

link elements that have an href attribute
```

### **All document modes (All versions)**

The `:enabled` state does not identify `a` or `area` elements with `href` attributes as enabled.

V0233: The `:valid` and `:invalid` pseudo-classes can match an element even if the constraints are violated by the initial value defined on the element

The specification states:

```
... Pseudo-classes
...
:valid

 The :valid pseudo-class must match any element falling into one of the following
 categories:
 ...

:invalid

 The :invalid pseudo-class must match any element falling into one of the
 following categories:
 ...
```

### **All document modes (All versions)**

The `:valid` and `:invalid` pseudo-classes can match an element even if the constraints are violated by the initial value defined on the element.

V0232: The `:indeterminate` pseudo-class does not match an `input[type=radio]` element when no option is selected

The specification states:

```
... Pseudo-classes
...
:indeterminate

 The :indeterminate pseudo-class must match any element falling into one of the
 following categories:
 ...
 • input elements whose type attribute is in the Radio Button state and whose
 radio button group contains no input elements whose checkedness state is true.
```

### **All document modes (All versions)**

The `:indeterminate` pseudo-class does not match the an `input` element whose type attribute is in the Radio Button state and whose radio button group contains no input elements whose checkedness state is true.

V0221: The `:active` pseudo-class does not match appropriate ancestors of an element that matches

The specification states:

```
... Pseudo-classes
...
```

:active

The :active pseudo-class is defined to match an element "while an element is being activated by the user". ...

...  
... element ... has a descendant that is currently matching the :active pseudo-class ...

### **All document modes (All versions)**

The :active pseudo-class does not match appropriate ancestors of an element that matches.

V0229: The :in-range and :out-of-range states are not supported

The specification states:

4.14.2 Pseudo-classes

...  
:in-range

The :in-range pseudo-class must match all elements that are candidates for constraint validation, have range limitations, and that are neither suffering from an underflow nor suffering from an overflow.

:out-of-range

The :out-of-range pseudo-class must match all elements that are candidates for constraint validation, have range limitations, and that are either suffering from an underflow or suffering from an overflow.

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The :in-range and :out-of-range states are not supported.

V0228: The :invalid pseudo-class does not match a fieldset element if that element has a child that is an :invalid candidate element

The specification states:

... Pseudo-classes  
...  
:invalid

The :invalid pseudo-class must match any element falling into one of the following categories:

- fieldset elements that have one or more descendant elements that themselves are candidates for constraint validation but do not satisfy their constraints

### **All document modes (All versions)**

The :invalid pseudo-class does not match a fieldset element if that element has a child that is an :invalid candidate element.

V0224: The `:default` state is not supported

The specification states:

```
4.14.2 Pseudo-classes
...
:default
```

The `:default` pseudo-class must match any element falling into one of the following categories:

***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

The `:default` state is not supported.

V0231: The `:link` pseudo-class does not match `area` or `link` elements with `href` attributes

The specification states:

```
... Pseudo-classes
...
:link
:visited
```

All `a` elements that have an `href` attribute, all `area` elements that have an `href` attribute, and all `link` elements that have an `href` attribute, must match one of `:link` and `:visited`.

***All document modes (All versions)***

The `:link` pseudo-class does not match `area` or `link` elements with `href` attributes.

V0225: The `:valid` pseudo-class does not match a `form` element if the form owns a `:valid` candidate element

The specification states:

```
... Pseudo-classes
...
:valid
```

The `:valid` pseudo-class must match any element falling into one of the following categories:

- `form` elements that are not the form owner of any elements that themselves are candidates for constraint validation but do not satisfy their constraints

***All document modes (All versions)***

The `:valid` pseudo-class does not match a `form` element if the form owns a `:valid` candidate element.

V0230: The `:read-only` and `:read-write` pseudo-classes are not supported

The specification states:

```
... Pseudo-classes
...
:read-only
:read-write

The :read-write pseudo-class must match any element falling into one of the
following categories, which for the purposes of Selectors are thus considered
user-alterable:
...
The :read-only pseudo-class must match all other HTML elements.
```

### **All document modes (All versions)**

The `:read-only` and `:read-write` pseudo-classes are not supported.

V0226: The `:valid` pseudo-class does not match a `fieldset` element if that element has a child that is a `:valid` candidate element

The specification states:

```
... Pseudo-classes
...
:valid

The :valid pseudo-class must match any element falling into one of the following
categories:
...
• fieldset elements that have no descendant elements that themselves are
candidates for constraint validation but do not satisfy their constraints
```

### **All document modes (All versions)**

The `:valid` pseudo-class does not match a `fieldset` element if that element has a child that is a `:valid` candidate element.

V0227: The `:invalid` pseudo-class does not match a `form` element if the form owns an `:invalid` candidate element

The specification states:

```
... Pseudo-classes
...
:invalid

The :invalid pseudo-class must match any element falling into one of the
following categories:
...
• form elements that are the form owner of one or more elements that
themselves are candidates for constraint validation but do not satisfy their
constraints
```

### **All document modes (All versions)**

The `:invalid` pseudo-class does not match a `form` element if the form owns an `:invalid` candidate element.

## 2.1.99 [HTML5] Section 5.1 Browsing contexts

V0234: The first `Document` is for the home page specified in the preferences, not for `about:blank`.

The specification states:

### 5.1 Browsing contexts

...

When a browsing context is first created, it must be created with a single `Document` in its session history, whose address is `about:blank`, which is marked as being an HTML document, whose character encoding is UTF-8, and which is both ready for post-load tasks and completely loaded immediately, along with a new `Window` object that the `Document` is associated with. The `Document` must have a single child `html` node, which itself has two empty child nodes: a `head` element, and a `body` element. As soon as this `Document` is created, the user agent must implement the sandboxing for it. If the browsing context has a creator `Document`, then the browsing context's `Document`'s `referrer` must be set to the address of that creator `Document` at the time of the browsing context's creation.

### **All document modes (All versions)**

The first `Document` is for the home page specified in the preferences, not for `about:blank`.

V0235: A newly created browsing context does not change the `readyState` from loading to complete

The specification states:

### 5.1 Browsing contexts

...

When a browsing context is first created, it must be created with a single `Document` in its session history, whose address is `about:blank`, which is marked as being an HTML document, whose character encoding is UTF-8, and which is both ready for post-load tasks and completely loaded immediately, along with a new `Window` object that the `Document` is associated with. ...

### **All document modes (All versions)**

A newly created browsing context does not change the `readyState` from loading to complete.

V0238: The `about:blank` document does not have a character encoding of UTF-8

The specification states:

### 5.1 Browsing contexts

...

When a browsing context is first created, it must be created with a single `Document` in its session history, whose address is `about:blank`, which is marked as being an HTML document, whose character encoding is UTF-8, and which is both ready for post-load tasks and completely loaded immediately, along with a new `Window` object that the `Document` is associated with. ...

### **All document modes (All versions)**

The `about:blank` document does not have a character encoding of UTF-8.

V0237: The referrer is set to the empty string, not the creator document

The specification states:

#### 5.1 Browsing contexts

...

If the browsing context has a creator Document, then the browsing context's Document's referrer must be set to the address of that creator Document at the time of the browsing context's creation.

### **All document modes (All versions)**

The referrer is set to the empty string, not the creator document.

## **2.1.100 [HTML5] Section 5.1.1.1 Navigating nested browsing contexts in the DOM**

V0240: The `frameElement` does not throw a security error

The specification states:

#### 5.1.1.1 Navigating nested browsing contexts in the DOM

...

The `frameElement` IDL attribute on the Window object of a Document `d`, on getting, must run the following algorithm:

1. If `d` is not a Document in a nested browsing context, return null and abort these steps.
2. If the browsing context container's Document does not have the same effective script origin as the effective script origin specified by the entry settings object, then throw a `SecurityError` exception and abort these steps.
3. Return the browsing context container for `b`.

### **All document modes (All versions)**

The `frameElement` does not throw a security error.

V0239: In a nested browsing context, the `frameElement` attribute returns undefined, not an object

The specification states:

#### 5.1.1.1 Navigating nested browsing contexts in the DOM

...

The `frameElement` IDL attribute on the Window object of a Document `d`, on getting, must run the following algorithm:

1. If `d` is not a Document in a nested browsing context, return null and abort these steps.

2. If the browsing context container's Document does not have the same effective script origin as the effective script origin specified by the entry settings object, then throw a SecurityError exception and abort these steps.
3. Return the browsing context container for b.

**All document modes (All versions)**

In a nested browsing context, the `frameElement` attribute returns undefined, not an object.

**2.1.101 [HTML5] Section 5.1.6 Browsing context names**

V0242: Links with the `noreferrer` keyword do not create a new browsing context

The specification states:

```

... Browsing context names
...
The rules for choosing a browsing context given a browsing context name are as follows. The rules assume that they are being applied in the context of a browsing context, as part of the execution of a task.
...
5. Otherwise, a new browsing context is being requested, and what happens depends on the user agent's configuration and abilities – it is determined by the rules given for the first applicable option from the following list:
...
 If the user agent has been configured such that in this instance it will create a new browsing context, and the browsing context is being requested as part of following a hyperlink whose link types include the noreferrer keyword

 A new top-level browsing context must be created. If the given browsing context name is not blank, then the new top-level browsing context's name must be the given browsing context name (otherwise, it has no name). The chosen browsing context must be this new browsing context. The creation of such a browsing context is a new start for session storage.

```

**All document modes (All versions)**

Links with the `noreferrer` keyword do not create a new browsing context.

V0241: An empty string for a context name prevents navigation within an `iframe` and attempts to show a popup

The specification states:

```

... Browsing context names
...
The rules for choosing a browsing context given a browsing context name are as follows. The rules assume that they are being applied in the context of a browsing context, as part of the execution of a task.

1. If the given browsing context name is the empty string or self, then the chosen browsing context must be the current one.

```

## **All document modes (All versions)**

An empty string for a context name prevents navigation within an iframe and attempts to show a popup.

### **2.1.102 [HTML5] Section 5.2 The Window object**

V0243: The stop function is not supported

The specification states:

```
5.2 The Window object

[Global]
/*sealed*/ interface Window : EventTarget {
 ...
 void stop();
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The stop function is not supported.

V0244: The locationbar, menubar, personalbar, scrollbars, statusbar, and toolbar attributes are not supported

The specification states:

```
5.2 The Window object

[Global]
/*sealed*/ interface Window : EventTarget {
 ...
 [Replaceable] readonly attribute BarProp locationbar;
 [Replaceable] readonly attribute BarProp menubar;
 [Replaceable] readonly attribute BarProp personalbar;
 [Replaceable] readonly attribute BarProp scrollbars;
 [Replaceable] readonly attribute BarProp statusbar;
 [Replaceable] readonly attribute BarProp toolbar;
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The locationbar, menubar, personalbar, scrollbars, statusbar and toolbar attributes are not supported.

V0245: The HTMLDocument property is not supported

The specification states:

## 5.2 The Window object

...

For historical reasons, Window objects must also have a writable, configurable, non-enumerable property named `HTMLDocument` whose value is the Document interface object.

### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

The `HTMLDocument` property is not supported.

## **2.1.103 [HTML5] Section 5.2.1 Security**

V0247: Many functions do not throw `SecurityError` exception when accessed from a different origin

The specification states:

### 5.2.1 Security

...

User agents must throw a `SecurityError` exception whenever any properties of a Window object are accessed when the incumbent settings object specifies an effective script origin that is not the same as the Window object's Document's effective script origin, with the following exceptions:

### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

The functions `alert`, `confirm`, `open`, `print`, `prompt` and `stop` do not throw a `SecurityError` exception when accessed from a different origin.

V0246: Many attributes do not throw a `SecurityError` exception when accessed from a different origin

The specification states:

### 5.2.1 Security

...

User agents must throw a `SecurityError` exception whenever any properties of a Window object are accessed when the incumbent settings object specifies an effective script origin that is not the same as the Window object's Document's effective script origin, with the following exceptions:

### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

Attributes `applicationCache`, `document`, `external`, `frameElement`, `history`, `locationbar`, `menubar`, `name`, `navigator`, `personalbar`, `scrollbars`, `statusbar`, `status`, and `toolbar` do not throw a `SecurityError` exception when accessed from a different origin.

V0248: Events do not throw a `SecurityError` exception when accessed from a different origin

The specification states:

### 5.2.1 Security

...

User agents must throw a `SecurityError` exception whenever any properties of a `Window` object are accessed when the incumbent settings object specifies an effective script origin that is not the same as the `Window` object's `Document`'s effective script origin, with the following exceptions:

### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

Events do not throw a `SecurityError` exception when accessed from a different origin

### **2.1.104 [HTML5] Section 5.2.2 APIs for creating and navigating browsing contexts by name**

V0249: No `InvalidAccessError` exception is thrown when the target argument does not result in a valid browsing context name

The specification states:

```
... APIs for creating and navigating browsing contexts by name
```

```
...
```

```
If ... [this results/would result] in there not being a chosen browsing context, then throw an InvalidAccessError exception and abort these steps.
```

### ***All document modes (All versions)***

No `InvalidAccessError` exception is thrown when the target argument does not result in a valid browsing context name.

V0250: The `stop` function is not supported

The specification states:

```
5.2.2 APIs for creating and navigating browsing contexts by name
```

```
...
```

```
The stop() method on Window objects should, if there is an existing attempt to navigate the browsing context and that attempt is not currently running the unload a document algorithm, cancel that navigation; then, it must abort the active document of the browsing context of the Window object on which it was invoked.
```

### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

The `stop` function is not supported.

### **2.1.105 [HTML5] Section 5.2.3 Accessing other browsing contexts**

V0252: Accessing window objects by index ignores descendant browsing contexts

The specification states:

### 5.2.3 Accessing other browsing contexts

...  
To determine the value of an indexed property index of a Window object, the user agent must return the WindowProxy object of the index'th child browsing context of the Document that is nested through an element that is in the Document, sorted in the tree order of the elements nesting those browsing contexts.

#### **All document modes (All versions)**

Accessing window objects by index ignores descendant browsing contexts.

V0251: The length attribute does not return the number of child browsing contexts of the active document

The specification states:

```
... Accessing other browsing contexts
...
The length IDL attribute['s getter] ... must return the number of child browsing
contexts ...
```

#### **All document modes (All versions)**

The length attribute does not return the number of child browsing contexts of the active document.

### **2.1.106 [HTML5] Section 5.2.4 Named access on the Window object**

V0253: Framesets are not identifiable by name

The specification states:

```
... Named access on the Window object
...
Named objects with the name name, for the purposes of the above algorithm, are those
that are either:
...
a, applet, area, embed, form, frameset, img, or object elements that have a name
content attribute whose value is name, or
...

```

#### **All document modes (All versions)**

Framesets are not identifiable by name.

### **2.1.107 [HTML5] Section 5.3.1 Relaxing the same-origin restriction**

V0254: No SecurityError exception is thrown if there is no browsing context et al.

The specification states:

```
5.3.1 Relaxing the same-origin restriction
...
```

On setting, the user agent must run the following algorithm:

1. If the Document has no browsing context, throw a `SecurityError` exception and abort these steps.
2. If the Document's active sandboxing flag set has its sandboxed document.domain browsing context flag set, throw a `SecurityError` exception and abort these steps.
3. If the new value is an IPv4 or IPv6 address, let new value be the new value. Otherwise, apply the IDNA ToASCII algorithm to the new value, with both the AllowUnassigned and UseSTD3ASCIIRules flags set, and let new value be the result of the ToASCII algorithm.

If ToASCII fails to convert one of the components of the string, e.g. because it is too long or because it contains invalid characters, then throw a `SecurityError` exception and abort these steps. [RFC5890]

4. If new value is not exactly equal to the current value of the document.domain attribute, then run these substeps:

1. If the current value is an IPv4 or IPv6 address, throw a `SecurityError` exception and abort these steps.
2. If new value, prefixed by a "." (U+002E), does not exactly match the end of the current value, throw a `SecurityError` exception and abort these steps.

Note: If the new value is an IPv4 or IPv6 address, it cannot match the new value in this way and thus an exception will be thrown here.

3. If new value matches a suffix in the Public Suffix List, or, if new value, prefixed by a "." (U+002E), matches the end of a suffix in the Public Suffix List, then throw a `SecurityError` exception and abort these steps. [PSL]

### **All document modes (All versions)**

No `SecurityError` exception is thrown if: there is no browsing context, the sandbox flag is set, and the new value is not exactly equal to the current value of `document.domain`.

## **2.1.108 [HTML5] Section 5.5.1 The session history of browsing contexts**

V0236: Nested browsing contexts share a session history

The specification states:

... The session history of browsing contexts  
...  
The sequence of Documents in a browsing context is its session history. Each browsing context, including nested browsing contexts, has a distinct session history. ...

### **All document modes (All versions)**

Nested browsing contexts share a session history.

## 2.1.109 [HTML5] Section 5.5.3.1 Security

V0255: The 'Location' object does not properly throw a Security Exception

The specification states:

```
5.5.3.1 Security
...
User agents must throw a SecurityError exception whenever any properties of a
Location object are accessed when the entry settings object specifies an effective
script origin that is not the same as the Location object's associated Document's
browsing context's active document's effective script origin, with the following
exceptions:
...
```

### **All document modes (All versions)**

The `Location` object does not properly throw a Security Exception and no exception is thrown.

## 2.1.110 [HTML5] Section 5.6.6 Page load processing model for media

V0256: Audio and video media are not loaded into a Document; instead a download is attempted

The specification states:

```
... Page load processing model for media

When an image, video, or audio resource is to be loaded in a browsing context, the
user agent should create a Document object, mark it as being an HTML document, set
its content type to the ... MIME type of the resource (type in the navigate
algorithm), ... append an html element to the Document, append a head element and a
body element to the html element, append an element host element for the media, as
described below, to the body element, and set the appropriate attribute of the
element host element, as described below, to the address of the image, video, or
audio resource.
```

### **All document modes (All versions)**

Audio and video media are not loaded into a `Document`; instead a download is attempted.

## 2.1.111 [HTML5] Section 5.6.7 Page load processing model for content that uses plugins

V0257: Plugins are not loaded into a newly created document; instead a download is attempted

The specification states:

```
... Page load processing model for content that uses plugins

When a resource that requires an external resource to be rendered is to be loaded in
a browsing context, the user agent should create a Document object, mark it as being
an HTML document and mark it as being a plugin document, set its content type to the
... MIME type of the resource (type in the navigate algorithm), ... append an html
element to the Document, append a head element and a body element to the html
element, append an embed to the body element, and set the src attribute of the embed
```

element to the address of the resource.

### **All document modes (All versions)**

Plugins are not loaded into a newly created document; instead a download is attempted.

#### **2.1.112 [HTML5] Section 5.6.10.1 Event definitions**

V0260: The HashChangeEventInit dictionary is not supported

The specification states:

```
5.6.10.1 Event definitions
...
dictionary HashChangeEventInit : EventInit {
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The HashChangeEventInit dictionary is not supported.

V0259: The HashChangeEvent interface is not supported

The specification states:

```
5.6.10.1 Event definitions
...
interface HashChangeEvent : Event {
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The HashChangeEvent interface is not supported.

V0258: The PopStateEventInit dictionary is not supported

The specification states:

```
5.6.10.1 Event definitions
...
dictionary PopStateEventInit : EventInit {
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The PopStateEventInit dictionary is not supported.

### 2.1.113 [HTML5] Section 5.6.11 Unloading documents

V0262: The ignore-opens-during-unload counter is not modified

The specification states:

```
... Unloading documents
...
When a user agent is [to prompt] to unload a document, it must run the following
steps.
...
2. Increase the Document's ignore-opens-during-unload counter by one.
```

#### **All document modes (All versions)**

The ignore-opens-during-unload counter is not modified.

### 2.1.114 [HTML5] Section 5.7.3.3 Parsing cache manifests

V0263: The settings parse mode is not supported

The specification states:

```
... Parsing cache manifests
...
When a user agent is to parse a manifest, it means that the user agent must run the
following steps:
...
... Process tokens as follows:
...
If mode is "settings"
 If tokens contains a single token, and that token is a case-sensitive
 match for the string "prefer-online", then set cache mode flag to
 prefer-online and jump back to the step labeled start of line.

 Otherwise, the line is an unsupported setting: do nothing; the line
 is ignored.
```

#### **All document modes (All versions)**

The settings parse mode is not supported.

### 2.1.115 [HTML5] Section 6.1.3.6 Runtime script errors

V0264: Muted errors functionality is not supported

The specification states:

```
6.1.3.6 Runtime script errors
...
When the user agent is required to report an error for a particular script script
```

with a particular position line:col, using a particular target target, it must run these steps, after which the error is either handled or not handled:

- ...
- 6. If script has muted errors, then set message to "Script error.", set location to the empty string, set line and col to 0, and set error object to null.

### **All document modes (All versions)**

Muted errors functionality is not supported because cross-origin restrictions are not enforced for scripts.

### **2.1.116 [HTML5] Section 6.1.3.6.2 The ErrorEvent interface**

V0267: The ErrorEventInit dictionary is not supported

The specification states:

```
6.1.3.6.2 The ErrorEvent interface
...
dictionary ErrorEventInit : EventInit {
 ...
};
```

### **IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The ErrorEventInit dictionary is not supported

V0265: The ErrorEvent interface is not supported

The specification states:

```
6.1.3.6.2 The ErrorEvent interface
...
interface ErrorEvent : Event {
 ...
};
```

### **All document modes (Internet Explorer 9 and Internet Explorer 8)**

The errorEvent interface is not supported.

V0266: The colno attribute of the ErrorEventInit interface is not supported

The specification states:

```
6.1.3.6.2 The ErrorEvent interface
...
dictionary ErrorEventInit : EventInit {
 ...
 unsigned long colno;
 ...
};
```

## **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `colno` attribute of the `ErrorEventInit` interface is not supported.

### **2.1.117 [HTML5] Section 6.1.5.1 Event handlers**

V0271: The form owner is not taken into account in events

The specification states:

```
... Event handlers
...
When the user agent is to get the current value of the event handler H, it must run
these steps:
 1. If H's value is an internal raw uncompiled handler, run these substeps:
 ...
 5. If element is not null and element has a form owner, let form owner be
 that form owner. Otherwise, let form owner be null.
```

### **All document modes (All versions)**

The form owner is not taken into account in events.

V0269: Removing an event content attribute does not remove the content attribute specified value from the event

The specification states:

```
6.1.5.1 Event handlers
...
When an event handler content attribute is removed, the user agent must set the
corresponding event handler to null.
```

### **IE11 Mode (All versions)**

Removing an event content attribute does not remove the content attribute specified value from the event.

V0268: The `body.onload` event does not overwrite the `window.onload` event

The specification states:

```
... Event handlers
...
If an event handler IDL attribute exposes an event handler of an object that doesn't
exist, it must always return null on getting and must do nothing on setting.
```

### **All document modes (All versions)**

The `body.onload` event does not overwrite the `window.onload` event.

## 2.1.118 [HTML5] Section 6.1.5.2 Event handlers on elements, Document objects, and Window objects

V0274: The oninvalid event handler is not supported

The specification states:

```
6.1.5.2 Event handlers on elements, Document objects, and Window objects
...
The following are the event handlers (and their corresponding event handler event
types) that must be supported by all HTML elements, as both event handler content
attributes and event handler IDL attributes; and that must be supported by all
Document and Window objects, as event handler IDL attributes:
...
oninvalid invalid
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The oninvalid event handler is not supported.

V0277: The onshow event handler is not supported

The specification states:

```
... Event handlers on elements, Document objects, and Window objects
...
The following are the event handlers (and their corresponding event handler event
types) that must be supported by all HTML elements, as both event handler content
attributes and event handler IDL attributes; and that must be supported by all
Document and Window objects, as event handler IDL attributes:
...
onshow show
```

### **All document modes (All versions)**

The onshow event handler is not supported.

V0279: The onpopstate event handler is not supported on the frameset element

The specification states:

```
... Event handlers on elements, Document objects, and Window objects
...
The following are the event handlers (and their corresponding event handler event
types) that must be supported by Window objects, as event handler IDL attributes on
the Window objects themselves, and with corresponding event handler content
attributes and event handler IDL attributes exposed on all body and frameset elements
that are owned by that Window object's Documents:
...
onpopstate popstate
```

### **All document modes (All versions)**

The `onpopstate` event handler is not supported on the `frameset` element.

V0275: The `onmouseenter` and `onmouseleave` event handlers are not supported on Document or Window

The specification states:

```
6.1.5.2 Event handlers on elements, Document objects, and Window objects
...
The following are the event handlers (and their corresponding event handler event
types) that must be supported by all HTML elements, as both event handler content
attributes and event handler IDL attributes; and that must be supported by all
Document and Window objects, as event handler IDL attributes:
...
onmouseenter mouseenter
onmouseleave mouseleave
```

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `onmouseenter` and `onmouseleave` event handlers are not supported on Document or Window.

V0272: The `oncancel` event handler is not supported

The specification states:

```
... Event handlers on elements, Document objects, and Window objects

The following are the event handlers (and their corresponding event handler event
types) that must be supported by all HTML elements, as both event handler content
attributes and event handler IDL attributes; and that must be supported by all
Document and Window objects, as event handler IDL attributes:
...
oncancel cancel
```

**All document modes (All versions)**

The `oncancel` event handler is not supported.

V0276: The `onresize` event handler is not supported on Document or HTML elements

The specification states:

```
... Event handlers on elements, Document objects, and Window objects
...
The following are the event handlers (and their corresponding event handler event
types) that must be supported by all HTML elements other than body and frameset
elements, as both event handler content attributes and event handler IDL attributes;
that must be supported by all Document objects, as event handler IDL attributes; and
that must be supported by all Window objects, as event handler IDL attributes on the
Window objects themselves, and with corresponding event handler content attributes
and event handler IDL attributes exposed on all body and frameset elements that are
owned by that Window object's Documents:
...
onresize resize
```

### **All document modes (All versions)**

The `onresize` event handler is not supported on `Document` or `HTML` elements.

V0373: The `onmouseenter` and `onmouseleave` event handlers are not supported on `Document`

The specification states:

```
... Event handlers on elements, Document objects, and Window objects
...
The following are the event handlers (and their corresponding event handler event
types) that must be supported by all HTML elements, as both event handler content
attributes and event handler IDL attributes; and that must be supported by all
Document and Window objects, as event handler IDL attributes:
...
onmouseenter mouseenter
onmouseleave mouseleave
```

### **EdgeHTML Mode (All versions)**

The `onmouseenter` and `onmouseleave` event handlers are not supported on `Document`.

V0273: The `oncuechange` event handler is not supported on `Document` or `Window`

The specification states:

```
... Event handlers on elements, Document objects, and Window objects
...
The following are the event handlers (and their corresponding event handler event
types) that must be supported by all HTML elements, as both event handler content
attributes and event handler IDL attributes; and that must be supported by all
Document and Window objects, as event handler IDL attributes:
...
oncuechange cuechange
```

### **All document modes (All versions)**

The `oncuechange` event handler is not supported on `Document` or `Window`.

V0278: The `ontoggle` event handler is not supported

The specification states:

```
... Event handlers on elements, Document objects, and Window objects
...
The following are the event handlers (and their corresponding event handler event
types) that must be supported by all HTML elements, as both event handler content
attributes and event handler IDL attributes; and that must be supported by all
Document and Window objects, as event handler IDL attributes:
...
ontoggle toggle
```

### **All document modes (All versions)**

The `ontoggle` event handler is not supported.

### 2.1.119 [HTML5] Section 6.3.1 Opening the input stream

V0281: The salvageable state of the Document is not set when the Document is unloaded

The specification states:

```
... Opening the input stream
...
When called with two arguments ..., the document.open() method must act as follows:
...
8. Set the Document's salvageable state to false.
```

#### **All document modes (All versions)**

The salvageable state of the Document is not set when the Document is unloaded.

V0280: The document object is not reused after `window.open` is called

The specification states:

```
... Opening the input stream

The open() method comes in several variants with different numbers of arguments.

document = document . open([type [, replace]])

Causes the Document to be replaced in-place, as if it was a new Document
object, but reusing the previous object, which is then returned.
```

#### **All document modes (All versions)**

The document object is not reused after `window.open` is called.

V0282: Singleton objects are not replaced for location, history, navigator, applicationCache, sessionStorage, or localStorage

The specification states:

```
... Opening the input stream
...
When called with two arguments ... , the document.open() method must act as follows:
...
... Replace the Document's singleton objects with new instances of those objects
... . (This includes in particular the ... Location, History, ApplicationCache,
and Navigator, objects, the various BarProp objects, the two Storage objects, the
various HTMLCollection objects, and objects defined by other specifications
It also includes all the Web IDL prototypes in the JavaScript binding, including
the Document object's prototype.)
```

#### **All document modes (All versions)**

Singleton objects are not replaced for `location`, `history`, `navigator`, `applicationCache`, `sessionStorage`, or `localStorage`.

V0283: The script-created parser is not freed from the script stack

The specification states:

```
... Opening the input stream
...
When called with two arguments ... , the document.open() method must act as follows:
...
... Create a new HTML parser and associate it with the document. This is a
script-created parser (meaning that it can be closed by the document.open() and
document.close() methods, and that the tokenizer will wait for an explicit call
to document.close() before emitting an end-of-file token). The encoding
confidence is irrelevant.
```

### **All document modes (All versions)**

The script-created parser is not freed from the script stack.

## **2.1.120 [HTML5] Section 6.3.2 Closing the input stream**

V0284: No `InvalidStateError` exception is thrown for a `Document` object not flagged as an HTML document

The specification states:

```
... Closing the input stream
...
The close() method must run the following steps:
1. If the Document object is [an XML document/not flagged as an HTML document],
throw an InvalidStateError exception and abort these steps.
```

### **All document modes (All versions)**

No `InvalidStateError` exception is thrown for a `Document` object not flagged as an HTML document.

## **2.1.121 [HTML5] Section 6.3.3 document.write()**

V0285: No `InvalidStateError` exception is thrown for a `Document` object not flagged as an HTML document

The specification states:

```
... document.write()
...
The document.write(...) method must act as follows:
1. If the method was invoked on an XML document, throw an InvalidStateError
exception and abort these steps.
```

### **All document modes (All versions)**

No `InvalidStateError` exception is thrown for a Document object not flagged as an HTML document.

#### **2.1.122 [HTML5] Section 6.6.1.1 Client identification**

V0288: The `taintEnabled` function is not supported

The specification states:

```
6.6.1.1 Client identification
...
[NoInterfaceObject]
interface NavigatorID {
 ...
 boolean taintEnabled(); // constant false
 ...
};
```

### **All document modes (All versions)**

The `taintEnabled` function is not supported.

V0290: The `product` attribute is not supported

The specification states:

```
6.6.1 The Navigator object
...
[NoInterfaceObject]
interface NavigatorID {
 ...
 readonly attribute DOMString product; // constant "Gecko"
 ...
};
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `product` attribute is not supported.

#### **2.1.123 [HTML5] Section 6.6.1.3 Custom scheme and content handlers**

V0292: The `NavigatorContentUtils` interface is implemented but does not support any functions

The specification states:

```
6.6.1.3 Custom scheme and content handlers

[NoInterfaceObject]
interface NavigatorContentUtils {
 // content handler registration
 void registerProtocolHandler(DOMString scheme, DOMString url, DOMString title);
```

```
void registerContentHandler(DOMString mimeType, DOMString url, DOMString title);
void unregisterProtocolHandler(DOMString scheme, DOMString url);
void unregisterContentHandler(DOMString mimeType, DOMString url);
};
```

### **All document modes (All versions)**

The `NavigatorContentUtils` interface is implemented but does not support any functions.

## **2.1.124 [HTML5] Section 6.6.1.4 Manually releasing the storage mutex**

V0293: The `cookieEnabled` attribute is defined on the `Navigator` interface directly, not on `NavigatorStorageUtils`

The specification states:

6.6.1.4 Manually releasing the storage mutex

```
[NoInterfaceObject]
interface NavigatorStorageUtils {
 readonly attribute boolean cookieEnabled;
 ...
};
```

### **All document modes (All versions)**

The `cookieEnabled` attribute is defined on the `Navigator` interface directly, not on `NavigatorStorageUtils`.

V0294: The `yieldForStorageUpdated` function is not supported

The specification states:

6.6.1.4 Manually releasing the storage mutex

```
[NoInterfaceObject]
interface NavigatorStorageUtils {
 ...
 void yieldForStorageUpdates();
};
```

### **All document modes (All versions)**

The `yieldForStorageUpdated` function is not supported.

## **2.1.125 [HTML5] Section 6.6.1.5 Plugins**

V0295: The `NavigatorPlugins` interface is not supported

The specification states:

```

... Plugins
...
[NoInterfaceObject]
interface NavigatorPlugins {
 ...
};

```

### **All document modes (All versions)**

The NavigatorPlugins interface is not supported.

V0296: The PluginArray, Plugin, MimeTypeArray and MimeType interfaces are not supported

The specification states:

```

6.6.1.5 Plugins

interface PluginArray {
 ...
};

interface MimeTypeArray {
 ...
};

interface Plugin {
 ...
};

interface MimeType {
 ...
};

```

### **IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The PluginArray, MimeTypeArray, Plugin, and MimeType interfaces are not supported.

## **2.1.126 [HTML5] Section 7.4.1 Sequential focus navigation and the tabIndex attribute**

V0297: tabIndex returns 0 as the default for elements that are not focusable

The specification states:

```

... ...
...
The tabIndex IDL attribute must reflect the value of the tabIndex content attribute.
Its default value is 0 for elements that are focusable and -1 for [for all other
elements./elements that are not focusable].

```

### **All document modes (All versions)**

tabIndex returns 0 as the default for elements that are not focusable.

### 2.1.127 [HTML5] Section 7.6.1 Making document regions editable: The contenteditable content attribute

V0299: An invalid value for the contentEditable attribute throws an "Invalid Argument" exception.

The specification states:

```
... Making document regions editable: The contenteditable content attribute
...
The contentEditable IDL attribute, on getting, must return the string "true" if the
content attribute is set to the true state, "false" if the content attribute is set
to the false state, and "inherit" otherwise. On setting, if the new value is an ASCII
case-insensitive match for the string "inherit" then the content attribute must be
removed, if the new value is an ASCII case-insensitive match for the string "true"
then the content attribute must be set to the string "true", if the new value is an
ASCII case-insensitive match for the string "false" then the content attribute must
be set to the string "false", and otherwise the attribute setter must throw a
["SyntaxError" DOMException/SyntaxError exception].
```

#### **All document modes (All versions)**

An invalid value for the contentEditable attribute throws an "Invalid Argument" exception.

V0298: The contentEditable attribute does not return inherit when its value is set to the empty string

The specification states:

```
... Making document regions editable: The contenteditable content attribute
...
The contenteditable ... attribute is an enumerated attribute whose keywords are the
empty string, true, and false. The empty string and the true keyword map to the true
state. The false keyword maps to the false state. In addition, there is a third
state, the inherit state, which is the missing value default (and the invalid value
default).
```

#### **All document modes (All versions)**

The contentEditable attribute does not return inherit when its value is set to the empty string.

### 2.1.128 [HTML5] Section 7.6.5 Spelling and grammar checking

V0301: The spellcheck attribute cannot be set to override the default when the default is true and the element was created using createElement

The specification states:

```
... Spelling and grammar checking
...
element . spellcheck [= value]

Returns true if the element is to have its spelling and grammar checked;
otherwise, returns false.

Can be set, to override the default and set the spellcheck content attribute.
```

### **All document modes (All versions)**

The `spellcheck` attribute cannot be set to override the default when the default is true and the element was created using `createElement`.

#### **2.1.129 [HTML5] Section 8.2 Parsing HTML documents**

V0302: Listed parse errors do not properly change states to the data state when an error occurs

The specification states:

##### 8.2 Parsing HTML documents

...

This specification defines the parsing rules for HTML documents, whether they are syntactically correct or not. Certain points in the parsing algorithm are said to be parse errors. The error handling for parse errors is well-defined (that's the processing rules described throughout this specification), but user agents, while parsing an HTML document, may abort the parser at the first parse error that they encounter for which they do not wish to apply the rules described in this specification.

### **All document modes (All versions)**

Listed parse errors do not properly change states to the data state when an error occurs.

#### **2.1.130 [HTML5] Section 8.2.3.1 The insertion mode**

V0303: The "in template" insertion mode is not implemented because the `template` element is not supported

The specification states:

##### 8.2.3.1 The insertion mode

...

Initially, the insertion mode is "initial". It can change to "before html", "before head", "in head", "in head noscript", "after head", "in body", "text", "in table", "in table text", "in caption", "in column group", "in table body", "in row", "in cell", "in select", "in select in table", "in template", "after body", "in frameset", "after frameset", "after after body", and "after after frameset" during the course of the parsing, as described in the tree construction stage. The insertion mode affects how tokens are processed and whether CDATA sections are supported.

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The "in template" insertion mode is not implemented because the `template` element is not supported.

V0304: There is no check of last, and no switch to the "in head" insertion mode

The specification states:

##### 8.2.3.1 The insertion mode

The insertion mode is a state variable that controls the primary operation of the tree construction stage.

...  
When the steps below require the UA to reset the insertion mode appropriately, it means the user agent must follow these steps:

...  
... If node is a head element and last is false, then switch the insertion mode to "in head" and abort these steps.

### **All document modes (All versions)**

There is no check of `last`, and no switch to the "in head" insertion mode.

## **2.1.131 [HTML5] Section 8.2.3.2 The stack of open elements**

V0305: Non-HTML namespace nested elements do not close table elements of the HTML namespace

The specification states:

8.2.3.2 The stack of open elements

...  
The stack of open elements is said to have a particular element in table scope when it has that element in the specific scope consisting of the following element types:

- `html` in the HTML namespace
- `table` in the HTML namespace
- `template` in the HTML namespace

### **All document modes (All versions)**

Non-HTML namespace nested elements do not close `table` elements of the HTML namespace.

## **2.1.132 [HTML5] Section 8.2.4.38 Attribute value (double-quoted) state**

V0306: NULL character U+0000 does not produce a parse error prior to changing the character to the replacement character U+FFFD

The specification states:

... Attribute value (double-quoted) state

Consume the next input character:

...  
U+0000 NULL  
Parse error. Append a U+FFFD REPLACEMENT CHARACTER character to the current attribute's value.

### **All document modes (All versions)**

NULL character U+0000 does not produce a parse error prior to changing the character to the replacement character U+FFFD.

### 2.1.133 [HTML5] Section 8.2.4.39 Attribute value (single-quoted) state

V0307: NULL character U+0000 does not produce a parse error prior to changing the character to the replacement character U+FFFD

The specification states:

```
... Attribute value (single-quoted) state
 Consume the next input character:
 ...
 U+0000 NULL
 Parse error. Append a U+FFFD REPLACEMENT CHARACTER character to the current
 attribute's value.
```

#### **All document modes (All versions)**

NULL character U+0000 does not produce a parse error prior to changing the character to the replacement character U+FFFD.

### 2.1.134 [HTML5] Section 8.2.4.45 Markup declaration open state

V0308: A non-HTML namespace CDATA section is not consumed properly and does not switch state

The specification states:

```
... Markup declaration open state
 ...
 Otherwise, if there is an adjusted current node and it is not an element in the HTML
 namespace and the next seven characters are a case-sensitive match for the string
 "[CDATA[" (the five uppercase letters "CDATA" with a U+005B LEFT SQUARE BRACKET
 character before and after), then consume those characters and switch to the CDATA
 section state.
```

#### **All document modes (All versions)**

A non-HTML namespace CDATA section is not consumed properly and does not switch state.

### 2.1.135 [HTML5] Section 8.2.4.48 Comment state

V0309: There is no parse error when a U+0000 NULL character is encountered

The specification states:

```
8.2.4.48 Comment state
 Consume the next input character:
 ...
 U+0000 NULL
 Parse error. Append a U+FFFD REPLACEMENT CHARACTER character to the current
 attribute's value.
```

### **All document modes (All versions)**

There is no parse error when a U+0000 NULL character is encountered.

### **2.1.136 [HTML5] Section 8.2.5 Tree construction**

V0310: MathML is not supported

The specification states:

```
8.2.5 Tree construction
...
A node is a MathML text integration point if it is one of the following elements:
```

### **All document modes (All versions)**

MathML is not supported.

### **2.1.137 [HTML5] Section 8.2.5.3 Closing elements that have implied end tags**

V0311: The `rb` and `rtc` elements are not supported and do not cause implied end tags to be generated

The specification states:

```
8.2.5.3 Closing elements that have implied end tags

When the steps below require the UA to generate implied end tags, then, while the
current node is a dd element, a dt element, an li element, an optgroup element, an
option element, a p element, an rb element, an rp element, an rt element, or an rtc
element, the UA must pop the current node off the stack of open elements.
```

### **All document modes (All versions)**

The `rb` and `rtc` elements are not supported and do not cause implied end tags to be generated.

### **2.1.138 [HTML5] Section 8.2.5.4.7 The "in body" insertion mode**

V0312: node is not removed from the list of active formatting elements

The specification states:

```
8.2.5.4.7 The "in body" insertion mode
...
The adoption agency algorithm, which takes as its only argument ... for which the
algorithm is being run, consists of the following steps:
...
... Let node and last node be furthest block. Follow these steps:
...
5. If inner loop counter is greater than three and node is in the list of
active formatting elements, then remove node from the list of active
formatting elements.
```

### **All document modes (All versions)**

*node* is not removed from the list of active formatting elements.

#### **2.1.139 [HTML5] Section 8.2.5.4.9 The "in table" insertion mode**

V0313: An input element within a table does not acknowledge the token's self-closing flag for the input element

The specification states:

##### 8.2.5.4.9 The "in table" insertion mode

When the user agent is to apply the rules for the "in table" insertion mode, the user agent must handle the token as follows:

...

A start tag whose tag name is "input"

If the token does not have an attribute with the name "type", or if it does, but that attribute's value is not an ASCII case-insensitive match for the string "hidden", then: act as described in the "anything else" entry below.

Otherwise:

Parse error.

Insert an HTML element for the token.

Pop that input element off the stack of open elements.

Acknowledge the token's self-closing flag, if it is set.

### **All document modes (All versions)**

An `input` element within a table does not acknowledge the token's self-closing flag for the `input` element.

#### **2.1.140 [HTML5] Section 8.2.5.4.11 The "in caption" insertion mode**

V0314: Some tags do not properly pop elements off the stack, clear the active formatting elements, or switch to "in table" insertion mode

The specification states:

##### 8.2.5.4.11 The "in caption" insertion mode

When the user agent is to apply the rules for the "in caption" insertion mode, the user agent must handle the token as follows:

...

A start tag whose tag name is one of: "caption", "col", "colgroup", "tbody", "td", "tfoot", "th", "thead", "tr"

An end tag whose tag name is "table"

...

Otherwise

...

Pop elements from this stack until a caption element has been popped from the stack.

Clear the list of active formatting elements up to the last marker.  
Switch the insertion mode to "in table".  
Reprocess the token.

### **All document modes (All versions)**

The start tags `caption`, `col`, `colgroup`, `tbody`, `td`, `tfoot`, `th`, `thead`, `tr` and the end tag `table` when nested within an open `caption` tag do not properly pop elements off the stack, clear the active formatting elements, or switch to "in table" insertion mode.

## **2.1.141 [HTML5] Section 8.2.5.4.17 The "in select in table" insertion mode**

V0315: End tags within a select tag within a table are not processed correctly and are ignored

The specification states:

8.2.5.4.17 The "in select in table" insertion mode

When the user agent is to apply the rules for the "in select in table" insertion mode, the user agent must handle the token as follows:

...  
An end tag whose tag name is one of: "caption", "table", "tbody", "tfoot", "thead", "tr", "td", "th"

Parse error.

If the stack of open elements does not have an element in table scope that is an HTML element and with the same tag name as that of the token, then ignore the token.

Otherwise:

Pop elements from the stack of open elements until a select element has been popped from the stack.

Reset the insertion mode appropriately.

Reprocess the token.

### **All document modes (All versions)**

End tags `caption`, `table`, `tbody`, `tfoot`, `thead`, `tr`, `td` and `th` within a `select` tag within a table are not processed correctly and are ignored.

## **2.1.142 [HTML5] Section 8.2.5.4.18 The "in template" insertion mode**

V0316: The template element is not supported

The specification states:

8.2.5.4.18 The "in template" insertion mode

When the user agent is to apply the rules for the "in template" insertion mode, the

user agent must handle the token as follows:

### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

The `template` element is not supported.

## **2.1.143 [HTML5] Section 8.2.5.5 The rules for parsing tokens in foreign content**

V0317: A U+0000 NULL character does not generate a parse error

The specification states:

### 8.2.5.5 The rules for parsing tokens in foreign content

When the user agent is to apply the rules for parsing tokens in foreign content, the user agent must handle the token as follows:

A character token that is U+0000 NULL  
Parse error. Insert a U+FFFD REPLACEMENT CHARACTER character.

### ***All document modes (All versions)***

A U+0000 NULL character does not generate a parse error.

## **2.1.144 [HTML5] Section 10.3.1 Hidden elements**

V0318: The `area`, `base`, `basefont`, `link`, `param`, `rp`, `source`, `template`, and `track` elements do not set a default style of `display: none`

The specification states:

```
10.3.1 Hidden elements
...
[hidden], area, base, basefont, datalist, head, link, ... meta,
noembed, noframes, param, rp, script, source, style, template, track, title {
 display: none;
}
```

### ***All document modes (All versions)***

The `area`, `base`, `basefont`, `link`, `param`, `rp`, `source`, `template`, and `track` elements do not set a default style of `display: none`.

V0319: The default style of the `noframes` element is set to `display: block`, not `display: none`

The specification states:

```
10.3.1 Hidden elements
...
[hidden], area, base, basefont, datalist, head, link, ... meta,
```

```
noembed, noframes, param, rp, script, source, style, template, track, title {
 display: none;
}
```

### **All document modes (All versions)**

The default style of the `noframes` element is set to `display: block`, not `display: none`.

V0320: The `embed` element when hidden does not set the default styles

The specification states:

```
10.3.1 Hidden elements
...
embed[hidden] { display: inline; height: 0; width: 0; }
```

### **All document modes (All versions)**

The `embed` element when hidden does not set the default styles. (It only hides the element.)

## **2.1.145 [HTML5] Section 10.3.3 Flow content**

V0323: The `listing`, `plaintext`, `pre`, and `xmp` elements do not set the `font-family` property to `monospace`

The specification states:

```
10.3.3 Flow content
...
listing, plaintext, pre, xmp {
 font-family: monospace; white-space: pre;
}
```

### **All document modes (All versions)**

The `listing`, `plaintext`, `pre`, and `xmp` elements do not set the `font-family` property to `monospace`.

V0321: The `legend` element is not set to `display: block`

The specification states:

```
10.3.3 Flow content
...
address, blockquote, center, div, figure, figcaption, footer, form, header, hr,
legend, listing, ... p, plaintext, pre, ..., xmp {
 display: block;
}
```

### **All document modes (All versions)**

The `legend` element is not set to `display: block`.

V0322: The listing, plaintext, and xmp elements do not set top or bottom margins in the default styles

The specification states:

```
10.3.3 Flow content
...
blockquote, figure, listing, p, plaintext, pre, xmp {
 margin-top: 1em; margin-bottom: 1em;
}
```

### **All document modes (All versions)**

The listing, plaintext, and xmp elements do not set top or bottom margins in the default styles.

V0324: The pre element, when the wrap attribute is specified, does not set the white-space property to pre-wrap

The specification states:

```
10.3.3 Flow content
...
pre[wrap] { white-space: pre-wrap; }
```

### **All document modes (All versions)**

The pre element, when the wrap attribute is specified, does not set the white-space property to pre-wrap.

## **2.1.146 [HTML5] Section 10.3.4 Phrasing content**

V0335: The size attribute of the font element sets the font-size property to the wrong value

The specification states:

```
10.3.4 Phrasing content
...
When a font element has a size attribute, the user agent is expected to use the
following steps, known as the rules for parsing a legacy font size, to treat the
attribute as a presentational hint setting the element's 'font-size' property:
...
12. Set 'font-size' to the keyword corresponding to the value of value according
to the following table:
```

| value | 'font-size' keyword | notes     |
|-------|---------------------|-----------|
| 1     | x-small             |           |
| 2     | small               |           |
| 3     | medium              |           |
| 4     | large               |           |
| 5     | x-large             |           |
| 6     | xx-large            |           |
| 7     | xxx-large           | see below |

The 'xxx-large' value is a non-CSS value used here to indicate a font size

50% larger than 'xx-large'.

**All document modes (All versions)**

The size attribute of the font element sets the font-size property to the wrong value:

| value | 'font-size' keyword | notes |
|-------|---------------------|-------|
| 1     | xx-small            |       |
| 2     | x-small             |       |
| 3     | small               |       |
| 4     | medium              |       |
| 5     | large               |       |
| 6     | x-large             |       |
| 7     | xx-large            |       |

V0328: The elements sub and sup do not set line-height in the default styles

The specification states:

```
10.3.4 Phrasing content
...
sub, sup { line-height: normal; font-size: smaller; }
```

**All document modes (All versions)**

The elements sub and sup do not set line-height in the default styles.

V0327: The elements small, sub, and sup do not set font-size: smaller in the default styles

The specification states:

```
10.3.4 Phrasing content
...
small { font-size: smaller; }
...
sub, sup { line-height: normal; font-size: smaller; }
```

**All document modes (All versions)**

The elements small, sub, and sup do not set font-size: smaller in the default styles.

V0333: The blink element does not have a defined default style

The specification states:

```
10.3.4 Phrasing content
...
blink { text-decoration: blink; }
```

### **All document modes (All versions)**

The `blink` element does not have a defined default style.

V0329: The `rt` element does not set `white-space`, `font-variant-east-asian`, and `text-emphasis` in the default styles

The specification states:

```
10.3.4 Phrasing content
...
rt {
 display: ruby-text;
 white-space: nowrap;
 font-size: 50%;
 font-variant-east-asian: ruby;
 text-emphasis: none;
}
```

### **All document modes (All versions)**

The `rt` element does not set `white-space`, `font-variant-east-asian`, and `text-emphasis` in the default styles.

V0332: The `abbr` and `acronym` elements do not set `text-decoration: dotted underline` default styles

The specification states:

```
10.3.4 Phrasing content
...
abbr[title], acronym[title] { text-decoration: dotted underline; }
```

### **All document modes (All versions)**

The `abbr` and `acronym` elements do not set `text-decoration: dotted underline` in default styles.

V0330: The `ruby`, `rb`, `rt`, `rbc`, and `rtc` elements do not set `unicode-bidi: isolate` in the default styles

The specification states:

```
10.3.4 Phrasing content
...
ruby, rb, rt, rbc, rtc { unicode-bidi: isolate; }
```

### **All document modes (All versions)**

The `ruby`, `rb`, `rt`, `rbc`, and `rtc` elements do not set `unicode-bidi: isolate` in the default styles.

V0334: The `br`, `nobr`, and `wbr` elements do not set any default styles

The specification states:

```
10.3.4 Phrasing content
...
br { content: '\A'; white-space: pre; }
nobr { white-space: nowrap; }
wbr { content: '\200B'; }
nobr wbr { white-space: normal; }
...
br[clear=left i] { clear: left; }
br[clear=right i] { clear: right; }
br[clear=all i], br[clear=both i] { clear: both; }
```

**All document modes (All versions)**

The `br`, `nobr`, and `wbr` elements do not set any default styles.

V0326: The `big` element does not set `font-size: larger` in the default styles

The specification states:

```
10.3.4 Phrasing content
...
big { font-size: larger; }
```

**All document modes (All versions)**

The `big` element does not set `font-size: larger` in the default styles.

V0331: Styles are not set for the `:link` and `:visited` states in the default styles

The specification states:

```
10.3.4 Phrasing content
...
:link { color: #0000EE; }
:visited { color: #551A8B; }
...
:link, :visited { text-decoration: underline; ... }
a:link[rel~=help], a:visited[rel~=help],
area:link[rel~=help], area:visited[rel~=help] { cursor: help; }
```

**All document modes (All versions)**

The following styles are not set for the `:link` and `:visited` states in the default styles:

```
:link { color: #0000EE; }
:visited { color: #551A8B; }
:link, :visited { text-decoration: underline; ... }
```

```
a:link[rel~=help], a:visited[rel~=help],
area:link[rel~=help], area:visited[rel~=help] { cursor: help; }
```

V0325: The `b` and `strong` elements set `font-weight: bold` instead of `font-weight: bolder`

The specification states:

```
10.3.4 Phrasing content
...
b, strong { font-weight: bolder; }
```

### **All document modes (All versions)**

The `b` and `strong` elements set `font-weight: bold` instead of `font-weight: bolder`.

## **2.1.147 [HTML5] Section 10.3.5 Bidirectional text**

V0336: All bidirectional text default styles are set incorrectly

The specification states:

```
10.3.5 Bidirectional text
[dir]:dir(ltr), bdi:dir(ltr), input[type=tel]:dir(ltr) { direction: ltr; }
[dir]:dir rtl, bdi:dir rtl) { direction: rtl; }

address, blockquote, center, div, figure, figcaption, footer, form,
header, hr, legend, listing, p, plaintext, pre, xmp, article,
aside, h1, h2, h3, h4, h5, h6, hgroup, main, nav, section, table, caption,
colgroup, col, thead, tbody, tfoot, tr, td, th, dir, dd, dl, dt,
ol, ul, li, bdi, output, [dir=ltr i], [dir=rtl i], [dir=auto i] {
 unicode-bidi: isolate;
}

bdo, bdo[dir] { unicode-bidi: isolate-override; }

textarea[dir=auto i], input[type=text][dir=auto i], input[type=search][dir=auto i],
input[type=tel][dir=auto i], input[type=url][dir=auto i], input[type=email][dir=auto
i],
pre[dir=auto i] {
 unicode-bidi: plaintext;
}
```

### **All document modes (All versions)**

All bidirectional text default styles are set incorrectly. The CSS `:dir` selector is not supported and `unicode-bidi` values `isolate`, `isolate-override`, and `plaintext` are not supported.

## **2.1.148 [HTML5] Section 10.3.6 Quotes**

V0337: No quote values are defined in the default styles

The specification states:

### 10.3.6 Quotes

...

User agents are expected to use either the block below (which will be regularly updated) or to automatically generate their own copy directly from the source material. ...

#### **All document modes (All versions)**

No quote values are defined in the default styles.

### **2.1.149 [HTML5] Section 10.3.7 Sections and headings**

V0338: No nesting rules for sections and headings are defined

The specification states:

#### 10.3.7 Sections and headings

...

The article, aside, nav, and section elements are expected to affect the margins and font size of h1 elements, as well as h2-h5 elements that follow h1 elements in hgroup elements, based on the nesting depth. If x is a selector that matches elements that are either article, aside, nav, or section elements, then the following rules capture what is expected:

```
@namespace url(http://www.w3.org/1999/xhtml);

x h1 { margin-top: 0.83em; margin-bottom: 0.83em; font-size: 1.50em; }
x x h1 { margin-top: 1.00em; margin-bottom: 1.00em; font-size: 1.17em; }
x x x h1 { margin-top: 1.33em; margin-bottom: 1.33em; font-size: 1.00em; }
x x x x h1 { margin-top: 1.67em; margin-bottom: 1.67em; font-size: 0.83em; }
x x x x x h1 { margin-top: 2.33em; margin-bottom: 2.33em; font-size: 0.67em; }

x hgroup > h1 ~ h2 { margin-top: 1.00em; margin-bottom: 1.00em; font-size: 1.17em; }
x x hgroup > h1 ~ h2 { margin-top: 1.33em; margin-bottom: 1.33em; font-size: 1.00em; }
x x x hgroup > h1 ~ h2 { margin-top: 1.67em; margin-bottom: 1.67em; font-size: 0.83em; }
x x x x hgroup > h1 ~ h2 { margin-top: 2.33em; margin-bottom: 2.33em; font-size: 0.67em; }

x hgroup > h1 ~ h3 { margin-top: 1.33em; margin-bottom: 1.33em; font-size: 1.00em; }
x x hgroup > h1 ~ h3 { margin-top: 1.67em; margin-bottom: 1.67em; font-size: 0.83em; }
x x x hgroup > h1 ~ h3 { margin-top: 2.33em; margin-bottom: 2.33em; font-size: 0.67em; }

x hgroup > h1 ~ h4 { margin-top: 1.67em; margin-bottom: 1.67em; font-size: 0.83em; }
x x hgroup > h1 ~ h4 { margin-top: 2.33em; margin-bottom: 2.33em; font-size: 0.67em; }

x hgroup > h1 ~ h5 { margin-top: 2.33em; margin-bottom: 2.33em; font-size: 0.67em; }
```

#### **All document modes (All versions)**

Nesting rules for sections and headings are not defined.

### **2.1.150 [HTML5] Section 10.3.8 Lists**

V0339: The dd element does not properly account for direction for default style margin settings

The specification states:

```
10.3.8 Lists
...
dd { margin-left: 40px; } /* LTR-specific: use 'margin-right' for rtl elements */
```

### **All document modes (All versions)**

The `dd` element does not properly account for direction for default style margin settings.

V0340: The `dl` element does not set margins within the default styles

The specification states:

```
10.3.8 Lists
...
dir, dl, ol, ul { margin-top: 1em; margin-bottom: 1em; }

dir dir, dir dl, dir ol, dir ul,
dl dir, dl dl, dl ol, dl ul,
ol dir, ol dl, ol ol, ol ul,
ul dir, ul dl, ul ol, ul ul {
 margin-top: 0; margin-bottom: 0;
}
```

### **All document modes (All versions)**

The `dl` element does not set margins within the default styles.

V0341: The elements `ol` and `li` do support the default styles for an attribute value of `type=A`, upper-alpha

The specification states:

```
10.3.8 Lists
...
ol[type=A], li[type=A] { list-style-type: upper-alpha; }
```

### **All document modes (All versions)**

The elements `ol` and `li` do not support the default styles for an attribute value of `type=A`, upper-alpha.

## **2.1.151 [HTML5] Section 10.3.9 Tables**

V0347: A form element within a table, `thead`, `tbody`, `tfoot`, or `tr` element is not set to `display: none`

The specification states:

```
10.3.9 Tables
...
In HTML documents, the user agent is expected to force the 'display' property of form elements that are children of table, thead, tbody, tfoot, or tr elements to compute
```

to 'none', irrespective of CSS rules.

### **All document modes (All versions)**

A form element within a table, thead, tbody, tfoot, or tr element is not set to display: none.

V0345: The default styles for the table element's frame and rules attributes are not properly defined

The specification states:

#### 10.3.9 Tables

```
...
table[rules=none i], table[rules=groups i], table[rules=rows i],
table[rules=cols i], table[rules=all i] {
 border-style: hidden;
 border-collapse: collapse;
}
table[border] { border-style: outset; } /* only if border is not equivalent to zero */
table[frame=void i] { border-style: hidden; }
table[frame=above i] { border-style: outset hidden hidden hidden; }
table[frame=below i] { border-style: hidden hidden outset hidden; }
table[frame=hsides i] { border-style: outset hidden outset hidden; }
table[frame=lhs i] { border-style: hidden hidden hidden outset; }
table[frame=rhs i] { border-style: hidden outset hidden hidden; }
table[frame=vsides i] { border-style: hidden outset; }
table[frame=box i], table[frame=border i] { border-style: outset; }

table[border] > tr > td, table[border] > tr > th,
table[border] > thead > tr > td, table[border] > thead > tr > th,
table[border] > tbody > tr > td, table[border] > tbody > tr > th,
table[border] > tfoot > tr > td, table[border] > tfoot > tr > th {
 /* only if border is not equivalent to zero */
 border-width: 1px;
 border-style: inset;
}
table[rules=none i] > tr > td, table[rules=none i] > tr > th,
table[rules=none i] > thead > tr > td, table[rules=none i] > thead > tr > th,
table[rules=none i] > tbody > tr > td, table[rules=none i] > tbody > tr > th,
table[rules=none i] > tfoot > tr > td, table[rules=none i] > tfoot > tr > th,
table[rules=groups i] > tr > td, table[rules=groups i] > tr > th,
table[rules=groups i] > thead > tr > td, table[rules=groups i] > thead > tr > th,
table[rules=groups i] > tbody > tr > td, table[rules=groups i] > tbody > tr > th,
table[rules=groups i] > tfoot > tr > td, table[rules=groups i] > tfoot > tr > th,
table[rules=rows i] > tr > td, table[rules=rows i] > tr > th,
table[rules=rows i] > thead > tr > td, table[rules=rows i] > thead > tr > th,
table[rules=rows i] > tbody > tr > td, table[rules=rows i] > tbody > tr > th,
table[rules=rows i] > tfoot > tr > td, table[rules=rows i] > tfoot > tr > th {
 border-width: 1px;
 border-style: none;
}
table[rules=cols i] > tr > td, table[rules=cols i] > tr > th,
table[rules=cols i] > thead > tr > td, table[rules=cols i] > thead > tr > th,
table[rules=cols i] > tbody > tr > td, table[rules=cols i] > tbody > tr > th,
table[rules=cols i] > tfoot > tr > td, table[rules=cols i] > tfoot > tr > th {
 border-width: 1px;
 border-style: none solid;
}
table[rules=all i] > tr > td, table[rules=all i] > tr > th,
table[rules=all i] > thead > tr > td, table[rules=all i] > thead > tr > th,
table[rules=all i] > tbody > tr > td, table[rules=all i] > tbody > tr > th,
table[rules=all i] > tfoot > tr > td, table[rules=all i] > tfoot > tr > th {
 border-width: 1px;
 border-style: solid;
}
}
```

```

table[rules=groups i] > colgroup {
 border-left-width: 1px;
 border-left-style: solid;
 border-right-width: 1px;
 border-right-style: solid;
}
table[rules=groups i] > thead,
table[rules=groups i] > tbody,
table[rules=groups i] > tfoot {
 border-top-width: 1px;
 border-top-style: solid;
 border-bottom-width: 1px;
 border-bottom-style: solid;
}

table[rules=rows i] > tr, table[rules=rows i] > thead > tr,
table[rules=rows i] > tbody > tr, table[rules=rows i] > tfoot > tr {
 border-top-width: 1px;
 border-top-style: solid;
 border-bottom-width: 1px;
 border-bottom-style: solid;
}

```

### **All document modes (All versions)**

The default styles for the `table` element's `frame` and `rules` attributes are not properly defined because the case-insensitive matching within the CSS attribute selector is not supported.

V0343: The `table`, `td`, and `th` elements do not set the correct border colors in the default styles

The specification states:

#### 10.3.9 Tables

```

...
table, td, th { border-color: gray; }
thead, tbody, tfoot, tr { border-color: inherit; }
table[rules=none i], table[rules=groups i], table[rules=rows i],
table[rules=cols i], table[rules=all i], table[frame=void i],
table[frame=above i], table[frame=below i], table[frame=hsides i],
table[frame=lhs i], table[frame=rhs i], table[frame=vsides i],
table[frame=box i], table[frame=border i],
table[rules=none i] > tr > td, table[rules=none i] > tr > th,
table[rules=groups i] > tr > td, table[rules=groups i] > tr > th,
table[rules=rows i] > tr > td, table[rules=rows i] > tr > th,
table[rules=cols i] > tr > td, table[rules=cols i] > tr > th,
table[rules=all i] > tr > td, table[rules=all i] > tr > th,
table[rules=none i] > thead > tr > td, table[rules=none i] > thead > tr > th,
table[rules=groups i] > thead > tr > td, table[rules=groups i] > thead > tr > th,
table[rules=rows i] > thead > tr > td, table[rules=rows i] > thead > tr > th,
table[rules=cols i] > thead > tr > td, table[rules=cols i] > thead > tr > th,
table[rules=all i] > thead > tr > td, table[rules=all i] > thead > tr > th,
table[rules=none i] > tbody > tr > td, table[rules=none i] > tbody > tr > th,
table[rules=groups i] > tbody > tr > td, table[rules=groups i] > tbody > tr > th,
table[rules=rows i] > tbody > tr > td, table[rules=rows i] > tbody > tr > th,
table[rules=cols i] > tbody > tr > td, table[rules=cols i] > tbody > tr > th,
table[rules=all i] > tbody > tr > td, table[rules=all i] > tbody > tr > th,
table[rules=none i] > tfoot > tr > td, table[rules=none i] > tfoot > tr > th,
table[rules=groups i] > tfoot > tr > td, table[rules=groups i] > tfoot > tr > th,
table[rules=rows i] > tfoot > tr > td, table[rules=rows i] > tfoot > tr > th,
table[rules=cols i] > tfoot > tr > td, table[rules=cols i] > tfoot > tr > th,
table[rules=all i] > tfoot > tr > td, table[rules=all i] > tfoot > tr > th {
 border-color: black;
}

```

```
}
```

### **All document modes (All versions)**

The `table`, `td`, and `th` elements do not set the border colors in the default styles. Any border colors that are set are defaulted to gray.

V0346: The default styles for the `table` element are not defined

The specification states:

```
10.3.9 Tables
...
table {
 font-weight: initial;
 font-style: initial;
 font-variant: initial;
 font-size: initial;
 line-height: initial;
 white-space: initial;
 text-align: initial;
}
```

### **IE5 (Quirks) Mode (All versions)**

The default styles for the `table` element are not defined.

V0344: The `th` element does not set `font-weight: bold` to the correct value in default styles

The specification states:

```
10.3.9 Tables
...
th { font-weight: bold; }
```

### **All document modes (All versions)**

The `th` element does not set `font-weight: bold` value in default styles.

V0348: Background images on `table` elements are not aligned relative to their respectively applied element

The specification states:

```
10.3.9 Tables
...
When a table, thead, tbody, tfoot, tr, td, or th element has a background attribute set to a non-empty value, the new value is expected to be resolved relative to the element, and if this is successful, the user agent is expected to treat the attribute as a presentational hint setting the element's 'background-image' property to the resulting absolute URL.
```

### **All document modes (All versions)**

Background images on table elements are not aligned relative to their respectively applied element. They are aligned based on the `table` element.

V0342: The table element does not set the `text-indent: initial` default style

The specification states:

```
10.3.9 Tables
...
table {
 box-sizing: border-box;
 border-spacing: 2px;
 border-collapse: separate;
 text-indent: initial;
}
```

### **All document modes (All versions)**

The `table` element does not set the `text-indent: initial` default style.

## **2.1.152 [HTML5] Section 10.3.11 Form controls**

V0349: The `input`, `select`, `option`, `optgroup`, `button`, `textarea` and `keygen` elements do not set `text-indent: initial` in default styles

The specification states:

```
10.3.11 Form controls
...
input, select, option, optgroup, button, textarea, keygen {
 text-indent: initial;
}
```

### **All document modes (All versions)**

The `input`, `select`, `option`, `optgroup`, `button`, `textarea`, and `keygen` elements do not set `text-indent: initial` in default styles.

V0351: The `input` elements other than `type=image` and `textarea` do not set `box-sizing: border-box` in the default styles

The specification states:

```
10.3.11 Form controls
...
In quirks mode, the following rules are also expected to apply:
@namespace url(http://www.w3.org/1999/xhtml);

input:not([type=image]), textarea { box-sizing: border-box; }
```

### **IE5 (Quirks) Mode (All versions)**

The `input` elements other than `type=image` and `textarea` elements do not set `box-sizing: border-box` in the default styles.

V0350: All input controls are set to `box-sizing: border-box`

The specification states:

```
10.3.11 Form controls
...
input[type="radio"], input[type="checkbox"], input[type="reset"],
input[type="button"],
input[type="submit"], select, button {
 box-sizing: border-box;
}
```

### **All document modes (All versions)**

All input controls, not just the `radio`, `checkbox`, `reset`, `button`, and `submit` controls, are set to `box-sizing: border-box`.

## **2.1.153 [HTML5] Section 10.3.12 The hr element**

V0353: When the `align` attribute is set, the default styles do not set the margin properties

The specification states:

```
10.3.9 Tables
...
table[align=center i] { margin-left: auto; margin-right: auto; }

10.3.12 The hr element
...
hr[align=left] { margin-left: 0; margin-right: auto; }
hr[align=right] { margin-left: auto; margin-right: 0; }
hr[align=center] { margin-left: auto; margin-right: auto; }
```

### **All document modes (All versions)**

When the `align` attribute is set, the default styles do not set the margin properties.

V0352: The color property for the `hr` element is not set to gray in the default styles

The specification states:

```
10.3.12 The hr element
...
hr { color: gray; border-style: inset; border-width: 1px; margin: 0.5em auto; }
```

### **All document modes (All versions)**

The `color` property for the `hr` element is not set to `gray` in the default styles. Instead the color used is `rgb(0, 0, 0)`, which is equivalent to `black`.

### 2.1.154 [HTML5] Section 10.3.13 The fieldset and legend elements

V0354: The `fieldset` element does not set the padding values or the border styles correctly in the default styles

The specification states:

```
10.3.13 The fieldset and legend elements
...
fieldset {
 ...
 margin-left: 2px; margin-right: 2px;
 border: groove 2px ThreeDFace;
 padding: 0.35em 0.625em 0.75em;
 ...
}
```

#### **All document modes (All versions)**

The `fieldset` element does not set the padding values or the border styles correctly in the default styles; instead it uses the value `groove 2px gray`.

### 2.1.155 [HTML5] Section 10.4.1 Embedded content

V0355: No default styles are applied to the `video` element

The specification states:

```
10.4.1 Embedded content
...
The following CSS rules are expected to apply:
...
video { object-fit: contain; }
```

#### **All document modes (All versions)**

No default styles are applied to the `video` element.

V0356: The default border style for the `iframe` element is `border-style: none` in default styles

The specification states:

```
10.4.1 Embedded content
...
The following CSS rules are expected to apply:
...
iframe { border: 2px inset; }
```

#### **All document modes (All versions)**

The default border style for the `iframe` element is `border-style: none` in default styles.

### 2.1.156 [HTML5] Section 10.4.2 Images

V0357: When the image does not load, the input element of `type=image` does not render as a button

The specification states:

```
10.4.2 Images
...
User agents are expected to render img elements and input elements whose type
attributes are in the Image Button state, according to the first applicable rules
from the following list:
...
If the element is an input element that does not represent an image and the user
agent does not expect this to change

 The user agent is expected to treat the element as a replaced element
 consisting of a button whose content is the element's alternative text. The
 intrinsic dimensions of the button are expected to be about one line in
 height and whatever width is necessary to render the text on one line.
```

#### **All document modes (All versions)**

When the image does not load, the `input` element of `type=image` does not render as a button.

### 2.1.157 [HTML5] Section 10.4.3 Attributes for embedded content and images

V0358: Default styles are not defined for align attributes on replaced elements

The specification states:

```
10.4.3 Attributes for embedded content and images
...
iframe[frameborder=0], iframe[frameborder=no i] { border: none; }

applet[align=left i], embed[align=left i], iframe[align=left i],
img[align=left i], input[type=image i][align=left i], object[align=left i] {
 float: left;
}

applet[align=right i], embed[align=right i], iframe[align=right i],
img[align=right i], input[type=image i][align=right i], object[align=right i] {
 float: right;
}

applet[align=top i], embed[align=top i], iframe[align=top i],
img[align=top i], input[type=image i][align=top i], object[align=top i] {
 vertical-align: top;
}

applet[align=baseline i], embed[align=baseline i], iframe[align=baseline i],
img[align=baseline i], input[type=image i][align=baseline i], object[align=baseline
i] {
 vertical-align: baseline;
}

applet[align=texttop i], embed[align=texttop i], iframe[align=texttop i],
img[align=texttop i], input[type=image i][align=texttop i], object[align=texttop i] {
```

```

 vertical-align: text-top;
 }

 applet[align=absmiddle i], embed[align=absmiddle i], iframe[align=absmiddle i],
 img[align=absmiddle i], input[type=image i][align=absmiddle i],
 object[align=absmiddle i],
 applet[align=abscenter i], embed[align=abscenter i], iframe[align=abscenter i],
 img[align=abscenter i], input[type=image i][align=abscenter i],
 object[align=abscenter i] {
 vertical-align: middle;
 }

 applet[align=bottom i], embed[align=bottom i], iframe[align=bottom i],
 img[align=bottom i], input[type=image i][align=bottom i],
 object[align=bottom i] {
 vertical-align: bottom;
 }

```

### **All document modes (All versions)**

Default styles are not defined for `align` attributes on replaced elements.

## **2.1.158 [HTML5] Section 10.4.4 Image maps**

V0359: A CSS cursor value set on the `area` element does not override settings on the `img` or `object` elements

The specification states:

### 10.4.4 Image maps

Shapes on an image map are expected to act, for the purpose of the CSS cascade, as elements independent of the original `area` element that happen to match the same style rules but inherit from the `img` or `object` element.

For the purposes of the rendering, only the 'cursor' property is expected to have any effect on the shape.

### **All document modes (All versions)**

A CSS `cursor` value set on the `area` element does not override settings on the `img` or `object` elements.

## **2.1.159 [HTML5] Section 10.5 Bindings**

V0360: Bindings are not supported

The specification states:

### 10.5 Bindings

#### 10.5.1 Introduction

A number of elements have their rendering defined in terms of the 'binding' property.

### **All document modes (All versions)**

Bindings are not supported; similar functionality is provided through non-CSS means.

#### **2.1.160 [HTML5] Section 10.5.11 The meter element**

V0361: The meter element is not supported

The specification states:

```
4.10.15 The meter element
...
The meter element represents a scalar measurement within a known range, or a
fractional value; for example disk usage, the relevance of a query result, or the
fraction of a voting population to have selected a particular candidate.
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The meter element is not supported.

#### **2.1.161 [HTML5] Section 11.3.4 Other elements, attributes and APIs**

V0370: The blink element is of type HTMLPhraseElement, not HTMLUnknownElement

The specification states:

```
11.3.4 Other elements, attributes and APIs
...
The blink, bgsound, isindex, multicol, nextid, and spacer elements must use the
HTMLUnknownElement interface.
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The blink element is of type HTMLPhraseElement, not HTMLUnknownElement.

V0365: The noHref attribute of the area element incorrectly returns -1 when set to true

The specification states:

```
... Other elements, attributes and APIs
...
The noHref IDL attribute of the area element must reflect the element's nohref
content attribute.
```

### **All document modes (All versions)**

The noHref attribute of the area element incorrectly returns -1 when set to true.

V0368: The align attribute of the input element does not return the value specified

The specification states:

```
... Other elements, attributes and APIs
...
The align IDL attribute of the input element must reflect the content attribute of
the same name.
```

### **All document modes (All versions)**

The align attribute of the input element does not return the value specified.

V0364: The body element attributes text, link, vLink, aLink, and bgColor return color values as hex color values

The specification states:

```
11.3.4 Other elements, attributes and APIs
...
The text IDL attribute of the body element must reflect the element's text content
attribute.

The link IDL attribute of the body element must reflect the element's link content
attribute.

The aLink IDL attribute of the body element must reflect the element's aLink content
attribute.

The vLink IDL attribute of the body element must reflect the element's vLink content
attribute.

The bgColor IDL attribute of the body element must reflect the element's bgColor
content attribute.
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The body element attributes text, link, vLink, aLink, and bgColor return color values as hex color values, not as specified.

V0372: The nextid element is of type HTMLNextIdElement, not HTMLUnknownElement

The specification states:

```
11.3.4 Other elements, attributes and APIs
...
The blink, bgsound, isindex, multicol, nextid, and spacer elements must use the
HTMLUnknownElement interface.
```

### **IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The nextid element is of type HTMLNextIdElement, not HTMLUnknownElement.

V0371: The `isindex` element is of type `HTMLIsIndexElement`, not `HTMLUnknownElement`

The specification states:

11.3.4 Other elements, attributes and APIs

...

The `blink`, `bgsound`, `isindex`, `multicol`, `nextid`, and `spacer` elements must use the `HTMLUnknownElement` interface.

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `isindex` element is of type `HTMLIsIndexElement`, not `HTMLUnknownElement`.

V0367: The `lowsrc` attribute is not implemented on the `HTMLImageElement` interface

The specification states:

11.3.4 Other elements, attributes and APIs

...

The `lowsrc` IDL attribute of the `img` element must reflect the element's `lowsrc` content attribute, which for the purposes of reflection is defined as containing a URL.

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `lowsrc` attribute is not implemented on the `HTMLImageElement` interface.

V0363: The `listing`, `plaintext`, and `xmp` elements are not implemented on the `HTMLDivElement` interface

The specification states:

11.3.4 Other elements, attributes and APIs

...

User agents must treat `listing` elements in a manner equivalent to `pre` elements in terms of semantics and for purposes of rendering.

...

User agents must treat `plaintext` elements in a manner equivalent to `pre` elements in terms of semantics and for purposes of rendering. (The parser has special behavior for this element, though.)

...

User agents must treat `xmp` elements in a manner equivalent to `pre` elements in terms of semantics and for purposes of rendering. (The parser has special behavior for this element though.)

**IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)**

The `listing`, `plaintext` and `xmp` elements are implemented on the `HTMLBlockElement` interface, not on `HTMLDivElement`.

V0369: The `pre` element does not convert the `width` attribute to a type long

The specification states:

11.3.4 Other elements, attributes and APIs

```
partial interface HTMLPreElement {
 attribute long width;
};
```

The width IDL attribute of the pre element must reflect the content attribute of the same name.

### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

The pre element does not convert the width attribute to a type long.

V0366: The align attribute of the embed element is not supported

The specification states:

... Other elements, attributes and APIs

```
...
The name and align IDL attributes of the embed element must reflect the respective
content attributes of the same name.
```

### ***All document modes (All versions)***

The align attribute of the embed element is not supported.

## **2.2 Clarifications**

The following subsections describe clarifications of the MAY and SHOULD requirements of [\[HTML5\]](#).

### **2.2.1 [HTML5] Section 2.2.1 Conformance classes**

C0002: Many platform restrictions are in place to prevent denial of service attacks

The specification states:

2.2.1 Conformance classes

```
...
User agents may impose implementation-specific limits on otherwise unconstrained
inputs, e.g. to prevent denial of service attacks, to guard against running out of
memory, or to work around platform-specific limitations.
```

### ***All document modes (All versions)***

Many platform restrictions are in place to prevent denial of service attacks.

C0001: The developer tools preserve the conformance errors and indicate errors either with a message in a console window or with a red underline for the specific error

The specification states:

```
2.2.1 Conformance classes
...
 Authoring tools and markup generators
 ...
 When an authoring tool is used to edit a non-conforming document, it may preserve
 the conformance errors in sections of the document that were not edited during
 the editing session (i.e. an editing tool is allowed to round-trip erroneous
 content). However, an authoring tool must not claim that the output is conformant
 if errors have been so preserved.
```

### **All document modes (All versions)**

The developer tools preserve the conformance errors and indicate errors either with a message in a console window or with a red underline for the specific error.

## **2.2.2 [HTML5] Section 2.2.2 Dependencies**

C0003: The WebVTT specification is a supported text track format for media resources

The specification states:

```
2.2.2 Dependencies
...
 WebVTT
 Implementations may support WebVTT as a text track format for subtitles,
 captions, chapter titles, metadata, etc, for media resources. [WEBVTT]
```

### **IE11 Mode, IE10 Mode, and EdgeHTML Mode (All versions)**

The WebVTT specification is a supported text track format for media resources.

## **2.2.3 [HTML5] Section 2.6.3 Encrypted HTTP and related security concerns**

C0004: There is no warning if the user visits a page that uses less secure encryption than it did on a prior visit by that user

The specification states:

```
2.6.3 Encrypted HTTP and related security concerns
...
 User agents should warn the user that there is a potential problem whenever the user
 visits a page that the user has previously visited, if the page uses less secure
 encryption on the second visit.
```

### **All document modes (All versions)**

There is no warning if the user visits a page that uses less secure encryption than it did on a prior visit by that user.

## 2.2.4 [HTML5] Section 2.6.7 CORS-enabled fetch

C0005: Cross-origin resource access errors are reported to the console

The specification states:

### 2.6.7 CORS-enabled fetch

When the user agent is required to perform a potentially CORS-enabled fetch of an absolute URL with a mode that is either "No CORS", "Anonymous", or "Use Credentials", optionally using a referrer source, with an origin, and with a default origin behaviour which is either "taint" or "fail", it must run the first applicable set of steps from the following list.

If mode is "No CORS" and default is taint

...

... The user agent may report a cross-origin resource access failure to the user (e.g. in a debugging console).

If mode is "No CORS"

...

... The user agent may report a cross-origin resource access failure to the user (e.g. in a debugging console).

## ***IE11 Mode, IE10 Mode, and EdgeHTML Mode (All versions)***

Cross-origin resource access failures are reported to the console.

## 2.2.5 [HTML5] Section 3.2.5.2 The title attribute

C0006: There is no indicator for elements that have a title attribute set

The specification states:

... The title attribute

...

User agents should inform the user when elements have advisory information, otherwise the information would not be discoverable.

## ***All document modes (All versions)***

There is no indicator for elements that have a title attribute set.

## 2.2.6 [HTML5] Section 3.2.5.3 The lang and xml:lang attributes

C0007: The lang attribute is used to determine which fonts and quotes to use within a document

The specification states:

... The lang and xml:lang attributes

...

User agents may use the element's language to determine proper processing or rendering (e.g. in the selection of appropriate fonts or pronunciations, for dictionary selection, or for the user interfaces of form controls such as date pickers).

## **IE11 Mode, IE10 Mode, IE9 Mode, and EdgeHTML Mode (All versions)**

The `lang` attribute is used to determine which fonts and quotes to use within a document.

### **2.2.7 [HTML5] Section 4.2.4 The link element**

C0009: Resources are obtained as needed unless a `prefetch` flag is set

The specification states:

```
4.2.4 The link element
...
User agents may opt to only try to obtain such resources when they are needed,
instead of pro-actively fetching all the external resources that are not applied.
```

#### **All document modes (All versions)**

Resources are obtained as needed. Proactive fetching occurs only when a specific `prefetch` flag is set.

C0010: When necessary the image sniffing rules are used to determine the official type

The specification states:

```
4.2.4 The link element
...
... Otherwise, if the resource is expected to be an image, user agents may apply the
image sniffing rules, with the official type being the type determined from the
resource's Content-Type metadata, and use the resulting ... type of the resource as
if it was the actual type. ...
```

#### **All document modes (All versions)**

When necessary the image sniffing rules are used to determine the official type.

C0008: There is no direct way for the user to access the hyperlinks created by the link element

The specification states:

```
4.2.4 The link element
...
Interactive user agents may provide users with a means to follow the hyperlinks
created using the link element, somewhere within their user interface. ...
```

#### **All document modes (All versions)**

There is no direct way for the user to access the hyperlinks created by the `link` element. However, there is programmatic access to the information through the `link` element itself.

## 2.2.8 [HTML5] Section 4.2.5.1 Standard metadata names

C0011: The title, not the application name, is used for UI in cases of page-created dialogs or tabs

The specification states:

```
4.2.5.1 Standard metadata names
...
application-name
...
User agents may use the application name in UI in preference to the page's title,
since the title might include status messages and the like relevant to the status
of the page at a particular moment in time instead of just being the name of the
application.
```

### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

The title, not the application name, is used for UI in cases of page-created dialogs or tabs.

C0085: The text "This site says..." is used for UI in cases of page-created dialogs

The specification states:

```
4.2.5.1 Standard metadata names
This specification defines a few names for the name attribute of the meta element.
...
application-name
...
User agents may use the application name in UI in preference to the page's title,
since the title might include status messages and the like relevant to the status
of the page at a particular moment in time instead of just being the name of the
application.
```

### ***EdgeHTML Mode (Microsoft Edge)***

The text "This site says..." is used for UI in cases of page-created dialogs.

## 2.2.9 [HTML5] Section 4.2.5.3 Pragma directives

C0012: There is no visual representation of timers or redirects, but there are indicators for link destinations

The specification states:

```
4.2.5.3 Pragma directives
...
Refresh state (http-equiv="refresh")

This pragma acts as timed redirect.
...
... [End:] Perform one or more of the following steps:
...
In addition, the user agent may, as with anything, inform the user of any and
all aspects of its operation, including the state of any timers, the
destinations of any timed redirects, and so forth.
```

### **All document modes (All versions)**

There is no visual representation of timers or redirects. However, there are indicators for destinations when hovering over a link.

#### **2.2.10 [HTML5] Section 4.3.9 The address element**

C0013: The information within an address element is displayed to the user

The specification states:

```
4.3.9 The address element
...
User agents may expose the contact information of a node to the user, or use it for
other purposes, such as indexing sections based on the sections' contact information.
```

### **All document modes (All versions)**

The information within an address element is displayed to the user.

#### **2.2.11 [HTML5] Section 4.4.4 The blockquote element**

C0014: There is no way for the user to follow citation links

The specification states:

```
... The blockquote element
...
... User agents may allow users to follow such citation links, but they are primarily
intended for private use (e.g. by server-side scripts collecting statistics about a
site's use of quotations), not for readers.

4.5.7. The q element
...
... User agents may allow users to follow such citation links, but they are primarily
intended for private use (e.g. by server-side scripts collecting statistics about a
site's use of quotations), not for readers.
```

### **All document modes (All versions)**

There is no way for the user to follow citation links.

#### **2.2.12 [HTML5] Section 4.4.7 The li element**

C0016: The minimum value of the value attribute is -2,147,483,648

The specification states:

```
4.4.7 The li element
...
The value attribute, if present, must be a valid integer giving the ordinal value of
the list item.
```

### **All document modes (All versions)**

The minimum value of the `value` attribute is -2,147,483,648. Any `li` element values that are smaller are set to this minimum.

C0015: The maximum value of the `value` attribute is 2,147,483,647

The specification states:

```
4.4.7 The li element
...
The value attribute, if present, must be a valid integer giving the ordinal value of
the list item.
```

### **All document modes (All versions)**

The maximum value of the `value` attribute is 2,147,483,647. Any `li` element values that are larger are set to this maximum.

## **2.2.13 [HTML5] Section 4.5.7 The `q` element**

C0014: There is no way for the user to follow citation links

The specification states:

```
... The blockquote element
...
... User agents may allow users to follow such citation links, but they are primarily
intended for private use (e.g. by server-side scripts collecting statistics about a
site's use of quotations), not for readers.

4.5.7. The q element
...
... User agents may allow users to follow such citation links, but they are primarily
intended for private use (e.g. by server-side scripts collecting statistics about a
site's use of quotations), not for readers.
```

### **All document modes (All versions)**

There is no way for the user to follow citation links.

## **2.2.14 [HTML5] Section 4.6.3 Attributes common to `ins` and `del` elements**

C0018: No way is provided for the user to follow citation links

The specification states:

```
4.6.3 Attributes common to ins and del elements
...
If the cite attribute is present, it must be a valid URL potentially surrounded by
spaces that explains the change. ... User agents may allow users to follow such
citation links, but they are primarily intended for private use (e.g. by server-side
```

scripts collecting statistics about a site's edits), not for readers.

### **All document modes (All versions)**

No way is provided for the user to follow citation links.

C0017: The datetime value is not shown to the user

The specification states:

```
4.6.3 Attributes common to ins and del elements
...
The datetime attribute may be used to specify the time and date of the change.
...
This value may be shown to the user, but it is primarily intended for private use.
```

### **All document modes (All versions)**

The datetime value is not shown to the user.

## **2.2.15 [HTML5] Section 4.7.1 The img element**

C0021: No image indicator is shown when the image is unavailable

The specification states:

```
... The img element
...
What an img element represents depends on the src attribute and the alt attribute.

 If the src attribute is set and the alt attribute is set to the empty string
 ...
 ... User agents may provide the user with a notification that an image is
 present but has been omitted from the rendering.
```

### **IE11 Mode and EdgeHTML Mode (All versions)**

No image indicator is shown when the image is unavailable. If alt text is available that text will be shown.

C0019: Images are obtained immediately

The specification states:

```
... The img element
...
In a browsing context where scripting is disabled, user agents may obtain images
immediately or on demand. ...
```

### **All document modes (All versions)**

Images are obtained immediately.

C0020: An unavailable image indicator is shown to the user when no image is available

The specification states:

4.7.1 The `img` element

...  
What an `img` element represents depends on the `src` attribute and the `alt` attribute.

If the `src` attribute is set and the `alt` attribute is set to the empty string

...  
... User agents may provide the user with a notification that an image is present but has been omitted from the rendering.

### ***IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

An unavailable image indicator is shown to the user when no image is available.

## **2.2.16 [HTML5] Section 4.7.3 The `embed` element**

C0022: The user is not provided an option to override the sandbox and instantiate the plugin anyway

The specification states:

... The `embed` element

...  
... The user agent may offer the user the option to override the sandbox and instantiate the plugin anyway; if the user invokes such an option, the user agent must act as if the conditions above did not apply for the purposes of this element.

### ***All document modes (All versions)***

The user is not provided an option to override the sandbox and instantiate the plugin anyway.

## **2.2.17 [HTML5] Section 4.7.6 The `video` element**

C0024: No external link is provided if the video cannot be rendered

The specification states:

... The `video` element

...  
User agents that cannot render the video may instead make the element represent a link to an external video playback utility or to the video data itself.

### ***All document modes (All versions)***

No external link is provided if the video cannot be rendered.

C0023: Visual indicators provide the state of the video

The specification states:

```
... The video element
...
In addition to the above, the user agent may provide messages to the user (such as
"buffering", "no video loaded", "error", or more detailed information) by overlaying
text or icons on the video or other areas of the element's playback area, or in
another appropriate manner.
```

**All document modes (All versions)**

Visual indicators provide the state of the video.

C0025: Videos can be played fullscreen

The specification states:

```
4.7.6 The video element
...
User agents may allow users to view the video content in manners more suitable to the
user (e.g. fullscreen or in an independent resizable window). ...
```

**All document modes (All versions)**

Videos can be played fullscreen.

C0026: Fullscreen videos show controls and ignore the controls attribute

The specification states:

```
... The video element
...
... In such an independent context, however, user agents may make full user
interfaces visible ... even if the controls attribute is absent.
```

**All document modes (All versions)**

Fullscreen videos show controls and ignore the `controls` attribute.

C0027: Screensavers are not disabled for fullscreen videos

The specification states:

```
... The video element
...
User agents may allow video playback to affect system features that could interfere
with the user's experience; for example, user agents could disable screensavers while
video playback is in progress.
```

**All document modes (All versions)**

Screensavers are not disabled for fullscreen videos.

## 2.2.18 [HTML5] Section 4.7.10.5 Loading the media resource

C0030: The preload attribute causes preloading of resources

The specification states:

```
... Loading the media resource
...
The preload attribute is intended to provide a hint to the user agent about what the
author thinks will lead to the best user experience. The attribute may be ignored
altogether, for example based on explicit user preferences or based on the available
connectivity.
```

### **All document modes (All versions)**

The preload attribute causes preloading of resources.

C0029: There is throttling at the networking level but not at the user agent level

The specification states:

```
4.7.10.5 Loading the media resource
...
The resource fetch algorithm for a media element and a given absolute URL is as
follows:

4. Perform a potentially CORS-enabled fetch of the current media resource's
absolute URL ...

... The rate of the download may also be throttled automatically by the user
agent, e.g. to balance the download with other connections sharing the same
bandwidth.
```

### **All document modes (All versions)**

There is throttling at the networking level but not at the user agent level.

C0031: Buffered data is discarded only if data becomes invalid

The specification states:

```
... Loading the media resource
...
User agents may discard previously buffered data.
```

### **All document modes (All versions)**

Buffered data is discarded only if data becomes invalid.

## 2.2.19 [HTML5] Section 4.7.10.8 Playing the media resource

C0032: Pitch adjustments are made when the playback rate is not 1.0

The specification states:

```
... Playing the media resource
...
... If the effective playback rate is not 1.0, the user agent may apply pitch
adjustments to the audio as necessary to render it faithfully.
```

### **All document modes (All versions)**

Pitch adjustments are made when the playback rate is not 1.0.

## 2.2.20 [HTML5] Section 4.7.10.12.6 Text tracks describing chapters

C0033: Chapters are not presented to the user in any way

The specification states:

```
... Text tracks describing chapters

Chapters are segments of a media resource with a given title. Chapters can be nested,
in the same way that sections in a document outline can have subsections.
```

### **All document modes (All versions)**

Chapters are not presented to the user in any way.

## 2.2.21 [HTML5] Section 4.7.10.13 User interface

C0035: The volume level and mute setting are not retained between navigations

The specification states:

```
... User interface
...
The volume attribute must return the playback volume of any audio portions of the
media element, in the range 0.0 (silent) to 1.0 (loudest). Initially, the volume
should be 1.0, but user agents may remember the last set value across sessions, on a
per-site basis or otherwise, so the volume may start at other values. ...

The muted attribute must return true if the audio output is muted and false
otherwise. Initially, the audio output should not be muted (false), but user agents
may remember the last set value across sessions, on a per-site basis or otherwise, so
the muted state may start as muted (true). ...
```

### **All document modes (All versions)**

The volume level and mute setting are not retained between navigations.

C0034: Controls are not provided if the controls attribute is absent

The specification states:

```
... User interface
...
... may provide controls to affect playback of the media resource ..., but such
features should not interfere with the page's normal rendering. ...
```

### **All document modes (All versions)**

Controls are not provided if the controls attribute is absent.

## **2.2.22 [HTML5] Section 4.8 Links**

C0036: The processing semantics of hyperlinks are not modified for some link types

The specification states:

```
4.8 Links
...
A hyperlink can have one or more hyperlink annotations that modify the processing
semantics of that hyperlink.
```

### **All document modes (All versions)**

The processing semantics of hyperlinks are not modified for the following rel link types: author, bookmark, help, license, nofollow, search and tag.

## **2.2.23 [HTML5] Section 4.8.1 Links created by a and area elements**

C0037: The user is not given a choice whether to navigate the hyperlink or download the resource

The specification states:

```
... Links created by a and area elements
...
When an a or area element's activation behavior is invoked, the user agent may allow
the user to indicate a preference regarding whether the hyperlink is to be used for
navigation or whether the resource it specifies is to be downloaded.
```

### **All document modes (All versions)**

The user is not given a choice whether to navigate the hyperlink or download the resource.

## **2.2.24 [HTML5] Section 4.10.5.1.5 E-mail state (type=email)**

C0039: Punycode in a value is not properly converted to IDN

The specification states:

#### 4.10.5.1.5 E-mail state (type=email)

...  
How the E-mail state operates depends on whether the multiple attribute is specified or not.

When the multiple attribute is not specified on the element

The input element represents a control for editing an e-mail address given in the element's value.

... User agents may transform the values for display and editing; in particular, user agents should convert punycode in the value to IDN in the display and vice versa.

### **All document modes (All versions)**

Punycode in a value is not properly converted to IDN.

C0038: Invalid email addresses are not allowed if the multiple attribute is not specified

The specification states:

#### 4.10.5.1.5 E-mail state (type=email)

...  
How the E-mail state operates depends on whether the multiple attribute is specified or not.

When the multiple attribute is not specified on the element

...  
... User agents may allow the user to set the value to a string that is not a valid e-mail address. ...

### **All document modes (All versions)**

Invalid email addresses are not allowed if the multiple attribute is not specified; otherwise they are allowed.

## **2.2.25 [HTML5] Section 4.10.5.1.14 File Upload state (type=file)**

C0040: The accept attribute is used to filter the file selection from the file picker

The specification states:

... File Upload state (type=file)

...  
User agents may use the value of this attribute to display a more appropriate user interface than a generic file picker. ...

### **IE11 Mode, IE10 Mode, IE9 Mode, and EdgeHTML Mode (All versions)**

The accept attribute is used to filter the file selection from the file picker.

## 2.2.26 [HTML5] Section 4.10.19.3 Limiting user input length: the maxlength attribute

C0041: A negative maxlength value is treated as if it were 0

The specification states:

```
... Limiting user input length: the maxlength attribute
...
If an element has its form control maxlength attribute specified, the attribute's
value must be a valid non-negative integer. If the attribute is specified and
applying the rules for parsing non-negative integers to its value results in a
number, then that number is the element's maximum allowed value length. If the
attribute is omitted or parsing its value results in an error, then there is no
maximum allowed value length.
```

### **All document modes (All versions)**

A negative maxlength value is treated as if it were 0. No characters are accepted.

## 2.2.27 [HTML5] Section 4.10.19.8 Autofilling form controls: the autocomplete attribute

C0042: Control values are stored and previously stored values are offered to the user

The specification states:

```
...
...
When an element's autofill field name is not "off", the user agent may store the
control's value, and may offer previously stored values to the user.
```

### **IE11 Mode, IE10 Mode, and EdgeHTML Mode (Internet Explorer 11, Internet Explorer 10, and Microsoft Edge)**

Control values are stored and previously stored values are offered to the user.

## 2.2.28 [HTML5] Section 4.10.21.2 Constraint validation

C0043: Constraint validation error reporting procedures

The specification states:

```
4.10.21.2 Constraint validation
...
If a user agent is to interactively validate the constraints of form element form,
then the user agent must run the following steps:
...
3. Report the problems with the constraints of at least one of the elements
given in unhandled invalid controls to the user. User agents may focus one of
those elements in the process, by running the focusing steps for that
element, and may change the scrolling position of the document, or perform
some other action that brings the element to the user's attention. User
agents may report more than one constraint violation. User agents may
coalesce related constraint violation reports if appropriate (e.g. if
multiple radio buttons in a group are marked as required, only one error need
be reported). If one of the controls is not being rendered (e.g. it has the
```

hidden attribute set) then user agents may report a script error.

### **IE11 Mode, IE10 Mode, and EdgeHTML Mode (All versions)**

Constraint validation error reporting procedures include:

- Reporting and marking all constraint violations on the form
- Placing red borders around the input fields
- Changing the scrolling position to the first violation

They do not include:

- Coalescing of related constraint violations
- Reporting of script errors

### **2.2.29 [HTML5] Section 4.10.22.7 Multipart form data**

C0044: Form fields, including filename fields, are encoded in UTF-8 and are not approximated

The specification states:

```
... Multipart form data
...
The multipart/form-data encoding algorithm is as follows:
...
5. ...
File names included in the generated multipart/form-data resource (as part of
file fields) must use the character encoding selected above, though the
precise name may be approximated if necessary (e.g. newlines could be removed
from file names, quotes could be changed to "%22", and characters not
expressible in the selected character encoding could be replaced by other
characters). ...
```

### **All document modes (All versions)**

Form fields, including filename fields, are encoded in UTF-8 and are not approximated.

### **2.2.30 [HTML5] Section 4.11.4.2 Serializing bitmaps to a file**

C0045: Many image formats other than PNG are supported

The specification states:

```
... Serializing bitmaps to a file
...
User agents must support PNG ("image/png"). User agents may support other types. If
the user agent does not support the requested type, it must create the file using the
PNG format.
```

### **All document modes (All versions)**

Many image formats other than PNG are supported (gif, jpeg, ico, bmp, etc.).

### 2.2.31 [HTML5] Section 5.1.3 Secondary browsing contexts

C0046: Some dialog boxes are secondary browsing contexts

The specification states:

#### 5.1.3 Secondary browsing contexts

User agents may support secondary browsing contexts, which are browsing contexts that form part of the user agent's interface, apart from the main content area.

#### **All document modes (All versions)**

Some dialog boxes are secondary browsing contexts (for example, the script error dialog).

### 2.2.32 [HTML5] Section 5.1.6 Browsing context names

C0048: If the sandboxed auxiliary navigation browsing context flag is set, a new browsing context is created

The specification states:

#### ... Browsing context names

...  
The rules for choosing a browsing context given a browsing context name are as follows. The rules assume that they are being applied in the context of a browsing context, as part of the execution of a task.

- ...
5. Otherwise, a new browsing context is being requested, and what happens depends on the user agent's configuration and abilities – it is determined by the rules given for the first applicable option from the following list:  
...

If the current browsing context's active document's active sandboxing flag set has the sandboxed auxiliary navigation browsing context flag set.

Typically, there is no chosen browsing context.

The user agent may offer to create a new top-level browsing context or reuse an existing top-level browsing context. ...

#### **All document modes (All versions)**

If the active sandboxing flag set of the current browsing context's active document has the sandboxed auxiliary navigation browsing context flag set, a new browsing context is created.

C0047: A message is shown to indicate that a popup window was blocked

The specification states:

#### 5.1.6 Browsing context names

...  
The rules for choosing a browsing context given a browsing context name are as

follows. The rules assume that they are being applied in the context of a browsing context, as part of the execution of a task.

- ...
5. Otherwise, a new browsing context is being requested, and what happens depends on the user agent's configuration and abilities – it is determined by the rules given for the first applicable option from the following list:

If the algorithm is not allowed to show a popup and the user agent has been configured to not show popups (i.e. the user agent has a "popup blocker" enabled)

There is no chosen browsing context. The user agent may inform the user that a popup has been blocked.

### ***IE11 Mode, IE10 Mode, IE9 Mode, IE8 Mode, IE7 Mode, and IE5 (Quirks) Mode (All versions)***

A message is shown to indicate that a popup window was blocked.

### **2.2.33 [HTML5] Section 5.2.2 APIs for creating and navigating browsing contexts by name**

C0049: The third argument, *features*, is used to define restrictions on windows that are created

The specification states:

5.2.2 APIs for creating and navigating browsing contexts by name

...  
The third argument, *features*, has no defined effect and is mentioned for historical reasons only. User agents may interpret this argument as instructions to set the size and position of the browsing context, but are encouraged to instead ignore the argument entirely.

### ***All document modes (All versions)***

The third argument, *features*, is used to define restrictions on windows that are created.

### **2.2.34 [HTML5] Section 5.5.1 The session history of browsing contexts**

C0050: Document objects are discarded based on content expiration, disk space usage, and preferences for content storage

The specification states:

... ...  
...  
User agents may discard the Document objects of entries other than the current entry that are not referenced from any script, reloading the pages afresh when the user or script navigates back to such pages. This specification does not specify when user agents should discard Document objects and when they should cache them.

### ***All document modes (All versions)***

Document objects are discarded based on content expiration, disk space usage, and preferences for content storage.

### 2.2.35 [HTML5] Section 5.5.2 The History interface

C0051: The maximum number of state objects added to the session history for a page is 1,048,576

The specification states:

```
... The History interface
...
User agents may limit the number of state objects added to the session history per
page. If a page hits the UA-defined limit, user agents must remove the entry
immediately after the first entry for that Document object in the session history
after having added the new entry. (Thus the state history acts as a FIFO buffer for
eviction, but as a LIFO buffer for navigation.)
```

#### ***IE11 Mode, IE10 Mode, IE9 Mode, and EdgeHTML Mode (All versions)***

The maximum number of state objects added to the session history for a page is 1,048,576.

### 2.2.36 [HTML5] Section 5.5.3 The Location interface

C0052: The user can set a flag to cause caches to be bypassed on a reload

The specification states:

```
5.5.3 The Location interface
...
When a user requests that the active document of a browsing context be reloaded
through a user interface element, the user agent should navigate the browsing context
to the same resource as that Document, with replacement enabled. ...
```

#### ***IE11 Mode, IE10 Mode, IE9 Mode, and IE8 Mode (All versions)***

The user can set a flag to cause caches to be bypassed on a reload.

### 2.2.37 [HTML5] Section 5.6.1 Navigating across documents

C0053: Navigation errors are shown for all document response codes other than code value 200

The specification states:

```
... Navigating across documents
...
When a browsing context is navigated to a new resource, the user agent must run the
following steps:
...
17. ...
... The user agent may indicate to the user that the navigation has been
aborted for security reasons.
18. ...
19. ...
```

- ... The user agent may indicate to the user that the original page load failed, and that the page used was a previously cached resource.  
...  
20. ...  
... but the user agent may indicate to the user that the original page load failed, that the page used was a fallback resource, and what the URL of the fallback resource actually is.  
...

### **All document modes (All versions)**

Navigation errors are shown for all document response codes other than code value 200.

## **2.2.38 [HTML5] Section 5.6.3 Page load processing model for XML files**

C0054: The root element performs a namespace-based lookup in order to determine if the content is a feed

The specification states:

```
... Page load processing model for XML files
...
User agents may examine the namespace of the root Element node of this Document object to perform namespace-based dispatch to alternative processing tools, e.g. determining that the content is actually a syndication feed and passing it to a feed handler. If such processing is to take place, abort the steps in this section, and jump to the next step (labeled non-document content) in the navigate steps above.
```

### **All document modes (All versions)**

The root element performs a namespace-based lookup in order to determine if the content is a feed.

## **2.2.39 [HTML5] Section 5.6.4 Page load processing model for text files**

C0055: No content is added to the head element of the document

The specification states:

```
... Page load processing model for text files
...
User agents may add content to the head element of the Document, ...
```

### **All document modes (All versions)**

No content is added to the head element of the document.

## **2.2.40 [HTML5] Section 5.6.6 Page load processing model for media**

C0056: A head section is added to the content of a Document

The specification states:

... Page load processing model for media  
...  
User agents may add content to the head element of the Document, or attributes to the element host element, e.g. to link to a style sheet ..., give the document a title, make the media autoplay, etc.

### **All document modes (All versions)**

A head section is added to the content of a Document.

## **2.2.41 [HTML5] Section 5.6.10 History traversal**

C0057: The scroll state is retained for back and forward navigations

The specification states:

... History traversal  
...  
When a user agent is required to traverse the history to a specified entry, optionally with replacement enabled, and optionally with the [non-blocking/asynchronous] events flag set, the user agent must act as follows.  
...  
9. If the entry is an entry with persisted user state, the user agent may ... update aspects of the document and its rendering ... .

### **All document modes (All versions)**

The scroll state is retained for back and forward navigations.

## **2.2.42 [HTML5] Section 5.6.11 Unloading documents**

C0058: The prompt does not show the returnValue

The specification states:

... Unloading documents  
...  
When a user agent is to prompt to unload a document, it must run the following steps.  
1. ...  
...  
The prompt shown by the user agent may include the string of the returnValue attribute, ...

### **All document modes (All versions)**

The prompt does not show the returnValue.

## **2.2.43 [HTML5] Section 5.6.12 Aborting a document load**

C0059: A user can invoke the abort a document algorithm by clicking the stop button in the address bar

The specification states:

```
... Aborting a document load
...
User agents may allow users to explicitly invoke the abort a document algorithm for a
Document. ...
```

### **All document modes (All versions)**

A user can invoke the abort a document algorithm by clicking the stop button in the address bar.

## **2.2.44 [HTML5] Section 5.7.4 Downloading or updating an application cache**

C0060: Caching progress is not shown

The specification states:

```
... Downloading or updating an application cache
...
Some of these steps have requirements that only apply if the user agent shows caching
progress. Support for this is optional. ...
```

### **All document modes (All versions)**

Caching progress is not shown.

## **2.2.45 [HTML5] Section 5.7.5 The application cache selection algorithm**

C0061: The user is not notified of an inconsistency between the cache manifest and the document metadata

The specification states:

```
5.7.5 The application cache selection algorithm
...
When the application cache selection algorithm algorithm is invoked with a Document
document and optionally a manifest URL manifest URL, the user agent must run the
first applicable set of steps from the following list:

 If there is a manifest URL, and document was loaded from an application cache,
 and the URL of the manifest of that cache's application cache group is not the
 same as manifest URL
 ...
 User agents may notify the user of the inconsistency between the cache
 manifest and the document's own metadata, to aid in application development.
```

### **All document modes (All versions)**

The user is not notified of an inconsistency between the cache manifest and the document metadata.

## 2.2.46 [HTML5] Section 5.7.8 Disk space

C0062: Deletion of specific application caches is not supported

The specification states:

```
... Disk space
...
User agents should allow users to see how much space each domain is using, and may offer the user the ability to delete specific application caches.
```

### **All document modes (All versions)**

Deletion of specific application caches is not supported. The application cache API provides no method to delete specific items.

## 2.2.47 [HTML5] Section 6.1.2 Enabling and disabling scripting

C0063: The user can set a preference to disable scripting

The specification states:

```
... Enabling and disabling scripting

Scripting is enabled in a browsing context when all of the following conditions are true:
 • ...
 • The user has not disabled scripting for this browsing context at this time.
 (User agents may provide users with the option to disable scripting globally, or in a finer-grained manner, e.g. on a per-origin basis.)
```

### **All document modes (All versions)**

The user can set a preference to disable scripting.

## 2.2.48 [HTML5] Section 6.1.3.4 Creating scripts

C0064: Script errors are reported to the console or to a popup

The specification states:

```
6.1.3.4 Creating scripts

When the specification says that a script is to be created, given some script source, a script source URL, its scripting language, a script settings object, and optionally a muted errors flag, the user agent must run the following steps:
...
7. ...
 Otherwise, report the error for script, with the problematic position (line number and column number), using the global object specified by the script settings object as the target. If the error is still not handled after this, then the error may be reported to the user.
```

### **All document modes (All versions)**

Script errors are reported to the console or to a popup.

## **2.2.49 [HTML5] Section 6.1.3.5 Killing scripts**

C0066: There are no quota restrictions

The specification states:

### 6.1.3.5 Killing scripts

User agents may impose resource limitations on scripts, for example CPU quotas, memory limits, total execution time limits, or bandwidth limitations. ...

## ***IE11 Mode, IE10 Mode, IE9 Mode, and EdgeHTML Mode (All versions)***

There are no quota restrictions.

C0065: The user can kill a script with the stop script feature

The specification states:

### 6.1.3.5 Killing scripts

...  
User agents are encouraged to allow users to disable scripting whenever the user is prompted either by a script (e.g. using the window.alert() API) or because of a script's actions (e.g. because it has exceeded a time limit).  
...

User agents may allow users to specifically disable scripts just for the purposes of closing a browsing context.

## ***IE11 Mode, IE10 Mode, IE9 Mode, and EdgeHTML Mode (All versions)***

The user can kill a script with the stop script feature.

## **2.2.50 [HTML5] Section 6.1.3.6.1 Runtime script errors in documents**

C0067: When an option is set, script errors are reported to the user

The specification states:

### 6.1.3.6.1 Runtime script errors in documents

... If the error is still not handled after this, then the error may be reported to the user.

## ***All document modes (All versions)***

When the 'Display a notification about every script error' option is set, script errors are reported to the user.

## 2.2.51 [HTML5] Section 6.1.5.1 Event handlers

C0068: An unparseable body results in an error reported to the user

The specification states:

```
... Event handlers
...
When the user agent is to get the current value of the event handler H, it must run
these steps:

1. If H's value is an internal raw uncompiled handler, run these substeps:
...
... If body is not parsable as FunctionBody or if parsing detects an early
error, then follow these substeps:
...
2. Report the error for the appropriate script and with the appropriate
position (line number and column number) given by location, using the
global object specified by script settings as the target. If the
error is still not handled after this, then the error may be reported
... .
```

### **All document modes (All versions)**

An unparseable body results in an error reported to the user.

## 2.2.52 [HTML5] Section 6.5.2 Printing

C0069: Printing events do not wait for the user to accept or decline

The specification states:

```
... Printing
...
The printing steps are as follows:
...
4. The user agent should offer the user the opportunity to obtain a physical
form (or the representation of a physical form) of the document. The user
agent may wait for the user to either accept or decline before returning; if
so, the user agent must pause while the method is waiting. Even if the user
agent doesn't wait at this point, the user agent must use the state of the
relevant documents as they are at this point in the algorithm if and when it
eventually creates the alternate form.
```

### **All document modes (All versions)**

Printing events do not wait for the user to accept or decline.

## 2.2.53 [HTML5] Section 7.1 The hidden attribute

C0070: Assistive technologies determine what is done with the hidden items

The specification states:

```
... The hidden attribute
...
```

When such features are available, User Agents may use them to expose the full semantics of hidden elements to AT when appropriate, if such content is referenced indirectly by an ID reference or valid hash-name reference. This allows ATs to access the structure of these hidden elements upon user request, while keeping the content hidden in all presentations of the normal document flow. Authors who wish to prevent user-initiated viewing of a hidden element should not reference the element with such a mechanism.

### **All document modes (All versions)**

Assistive technologies have access to elements that are in the hidden state, and those technologies determine what is done with the hidden items.

## **2.2.54 [HTML5] Section 7.2 Inert subtrees**

C0072: Selection and find on a page are prevented from working when the page is inert because of a dialog

The specification states:

... Inert subtrees

... When a node is inert, then the user agent must act as if the node was absent for the purposes of targeting user interaction events, may ignore the node for the purposes of text search user interfaces (commonly known as "find in page"), and may prevent the user from selecting text in that node. ...

### **All document modes (All versions)**

Selection and find on a page are prevented from working when the page is inert because of a dialog.

## **2.2.55 [HTML5] Section 7.4 Focus**

C0071: Tracking focus follows platform conventions

The specification states:

7.4 Focus

...  
User agents may track focus for each browsing context or Document individually, or may support only one focused element per top-level browsing context – user agents should follow platform conventions in this regard.

### **All document modes (All versions)**

Tracking focus follows platform conventions.

## **2.2.56 [HTML5] Section 7.4.2 Focus management**

C0073: Focusable elements follow the platform conventions for accessibility

The specification states:

```
7.4.2 Focus management
...
Notwithstanding the above, user agents may make any element or part of an element
focusable, especially to aid with accessibility or to better match platform
conventions.
```

### **All document modes (All versions)**

Focusable elements follow the platform conventions for accessibility.

## **2.2.57 [HTML5] Section 7.4.4 Element-level focus APIs**

C0074: The blur function is not ignored on elements but is ignored on the window object

The specification states:

```
... ...
...
The blur() method, when invoked, should run the unfocusing steps for the element on
which the method was called User agents may selectively or uniformly ignore
calls to this method for usability reasons.
```

### **All document modes (All versions)**

The blur function is not ignored on elements but is ignored on the window object.

## **2.2.58 [HTML5] Section 7.5.3 Processing model**

C0075: The fallback assigns an access key which is based on the x-ms-acceleratorKey

The specification states:

```
... Processing model
...
Whenever an element's accesskey attribute is set, changed, or removed, the user agent
must update the element's assigned access key by running the following steps:
...
... Fallback: Optionally, the user agent may assign a key combination of its
choosing as the element's assigned access key and then abort these steps.
```

### **IE11 Mode and IE10 Mode (All versions)**

The fallback assigns an access key combination which is based on the x-ms-acceleratorKey.

C0076: The fallback option to assign a key combination as the access key is not used

The specification states:

```
... Processing model
...
```

Whenever an element's `accesskey` attribute is set, changed, or removed, the user agent must update the element's assigned access key by running the following steps:

```
...
... Fallback: Optionally, the user agent may assign a key combination of its
choosing as the element's assigned access key and then abort these steps.
```

### ***IE9 Mode and IE8 Mode (All versions)***

The fallback option to assign a key combination as the access key is not used.

## **2.2.59 [HTML5] Section 7.6.5 Spelling and grammar checking**

C0077: The `lang` attribute defined on an element determines the spellcheck language

The specification states:

```
... Spelling and grammar checking
...
If the checking is enabled for a word/sentence/text, the user agent should indicate
spelling and grammar errors in that text. User agents should take into account the
other semantics given in the document when suggesting spelling and grammar
corrections. User agents may use the language of the element to determine what
spelling and grammar rules to use, or may use the user's preferred language settings.
UAs should use input element attributes such as pattern to ensure that the resulting
value is valid, where possible.
```

### ***All document modes (All versions)***

The `lang` attribute defined on an element determines the spellcheck language.

C0078: Spelling and grammar errors on the text preloaded with the page are not reported

The specification states:

```
... Spelling and grammar checking
...
Even when checking is enabled, user agents may opt to not report spelling or grammar
errors in text that the user agent deems the user has no interest in having checked
(e.g. text that was already present when the page was loaded, or that the user did
not type, or text in controls that the user has not focused, or in parts of e-mail
addresses that the user agent is not confident were misspelt). ...
```

### ***All document modes (All versions)***

Spelling and grammar errors on the text preloaded with the page are not reported.

## **2.2.60 [HTML5] Section 8.2 Parsing HTML documents**

C0079: Parsing continues even if there are parsing errors

The specification states:

## 8.2 Parsing HTML documents

...

This specification defines the parsing rules for HTML documents, whether they are syntactically correct or not. Certain points in the parsing algorithm are said to be parse errors. The error handling for parse errors is well-defined (that's the processing rules described throughout this specification), but user agents, while parsing an HTML document, may abort the parser at the first parse error that they encounter for which they do not wish to apply the rules described in this specification.

### **All document modes (All versions)**

Parsing continues even if there are parsing errors. The errors are reported to the console. An abort does not occur unless there is a catastrophic failure.

### **2.2.61 [HTML5] Section 8.2.7 Coercing an HTML DOM into an infoset**

C0081: Local names of elements and attributes are limited to the ASCII character range

The specification states:

#### 8.2.7 Coercing an HTML DOM into an infoset

...

If the XML API being used restricts the allowable characters in the local names of elements and attributes, then the tool may map all element and attribute local names that the API wouldn't support to a set of names that are allowed, by replacing any character that isn't supported with the uppercase letter U and the six digits of the character's Unicode code point when expressed in hexadecimal, using digits 0-9 and capital letters A-F as the symbols, in increasing numeric order.

### **All document modes (All versions)**

Local names of elements and attributes are limited to the ASCII character range.

C0080: Attributes are dropped if they start with xmlns in the case of no namespace

The specification states:

#### 8.2.7 Coercing an HTML DOM into an infoset

...

If the XML API doesn't support attributes in no namespace that are named "xmlns", attributes whose names start with "xmlns:", or attributes in the XMLNS namespace, then the tool may drop such attributes.

### **All document modes (All versions)**

Attributes are dropped if they start with xmlns: in the case of no namespace.

C0082: No space is inserted between consecutive "-" (U+002D) characters or after one that ends a line

The specification states:

#### 8.2.7 Coercing an HTML DOM into an infoset

...

If the XML API restricts comments from having two consecutive U+002D HYPHEN-MINUS characters (--), the tool may insert a single U+0020 SPACE character between any such offending characters.

If the XML API restricts comments from ending in a U+002D HYPHEN-MINUS character (-), the tool may insert a single U+0020 SPACE character at the end of such comments.

### **All document modes (All versions)**

No space is inserted between consecutive "-" (U+002D) characters or after one that ends a line.

## **2.2.62 [HTML5] Section 9.3 Serializing XHTML fragments**

C0083: When XHTML documents are serialized, prefixes and namespace declarations are adjusted as needed

The specification states:

#### 9.3 Serializing XHTML fragments

...

In both cases, the string returned must be XML namespace-well-formed and must be an isomorphic serialization of all of that node's relevant child nodes, in tree order. User agents may adjust prefixes and namespace declarations in the serialization (and indeed might be forced to do so in some cases to obtain namespace-well-formed XML). User agents may use a combination of regular text and character references to represent Text nodes in the DOM.

### **All document modes (All versions)**

When XHTML documents are serialized, prefixes and namespace declarations are adjusted as needed.

## **2.2.63 [HTML5] Section 11.3.4 Other elements, attributes and APIs**

C0084: The scheme attribute is not used as an extension of the name attribute

The specification states:

... Other elements, attributes and APIs

...

User agents may treat the scheme content attribute on the meta element as an extension of the element's name content attribute when processing a meta element with a name attribute whose value is one that the user agent recognizes as supporting the scheme attribute.

### **All document modes (All versions)**

The scheme attribute is not used as an extension of the name attribute.

## 2.3 Extensions

The following subsections describe extensions to the requirements of [\[HTML5\]](#).

### 2.3.1 [HTML5] Section 7.6.2 Making entire documents editable: The designMode IDL attribute

E0001: If the designMode IDL attribute matches the value "inherit" then designMode is enabled if the parent designMode is enabled, and disabled if the parent designMode is disabled

The specification states:

```
7.6.2 Making entire documents editable: The designMode IDL attribute
...
The designMode IDL attribute on the Document object takes two values, "on" and "off".
On setting, the new value must be compared in an ASCII case-insensitive manner to
these two values; if it matches the "on" value, then designMode must be enabled, and
if it matches the "off" value, then designMode must be disabled. Other values must be
ignored.
```

#### ***All document modes (All versions)***

If the designMode IDL attribute matches the value "inherit" then designMode is enabled if the parent designMode is enabled, and disabled if the parent designMode is disabled.

## 2.4 Error Handling

There are no additional considerations for error handling.

## 2.5 Security

There are no additional security considerations.

### 3 Change Tracking

This section identifies changes that were made to this document since the last release. Changes are classified as Major, Minor, or None.

The revision class **Major** means that the technical content in the document was significantly revised. Major changes affect protocol interoperability or implementation. Examples of major changes are:

- A document revision that incorporates changes to interoperability requirements.
- A document revision that captures changes to protocol functionality.

The revision class **Minor** means that the meaning of the technical content was clarified. Minor changes do not affect protocol interoperability or implementation. Examples of minor changes are updates to clarify ambiguity at the sentence, paragraph, or table level.

The revision class **None** means that no new technical changes were introduced. Minor editorial and formatting changes may have been made, but the relevant technical content is identical to the last released version.

The changes made to this document are listed in the following table. For more information, please contact [dochelp@microsoft.com](mailto:dochelp@microsoft.com).

| Section                                                    | Description                                                                                                                                       | Revision class |
|------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------|----------------|
| <a href="#">2.1</a> Normative Variations                   | The following specification sections formerly had variations, and now do not: 3.1.1, 4.7.2, 4.7.10.1, 4.10.4, 4.10.14, 4.10.19.4, 6.6.1, 6.6.1.2. | Minor          |
| <a href="#">2.2.13</a> [HTML5] Section 4.5.7 The q element | Clarification C0014 is new.                                                                                                                       | Minor          |

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