

# Sven Sauleau

@svensauleau

*BABEL*



# Understanding the Differences Is Accepting

## Wat

A lightning talk by Gary Bernhardt from CodeMash 2012

```
failbowl:~(master!?) $ jsc
> [] + []

> [] + {}
[object Object]
> {} + []
0
> {} + {}
```

# Question

```
1 switch (0) {  
2     case 0:  
3         a();  
4         break;  
5  
6     case 1:  
7         function a() { console.log("foo"); }  
8         break;  
9 }
```

What's the output?

1. "foo"
2. a is not defined

```
1 switch (0) {  
2   case 0:  
3     a();  
4     break;  
5  
6   case 1:  
7     function a() { console.log("foo"); }  
8     break;  
9 }
```

1. the `switch` body creates a new scope
2. `cases` are not creating a new scope
3. function declarations are hoisted

# Fix

```
1 switch (0) {  
2     case 0:  
3         a();  
4         break;  
5  
6     case 1: { // <--  
7         function a() { console.log("foo"); }  
8         break;  
9     } // <--  
10 }
```

# Question

```
1 "\n\t\r\n\t\r" == false
```

**What's the output?**

1. true
2. false
3.  $x > \infty$

```
1 "\n\t\r\n\t\r" == false
```

1. `\t`, `\n` and `\r` are expanded to empty string
2. empty string is `falsy`



```
1 NaN == NaN
```

**What's the output?**

1. true
2. true (because it can't be false)

Unrepresentable/broken value

## **6.1.6 The Number Type**

“[...] all NaN values are indistinguishable from each other.”

## **7.2.15 Strict Equality Comparison**

“2.a If x is NaN, return false or 2.b If y is NaN, return false.”

```
1 Math.pow(2, 53) + 1 === Math.pow(2, 53)
```

**What's the output?**

1. true
2. false
3. quantum state

1 `Math.pow(2, 53) + 1 === Math.pow(2, 53)`

## 6.1.6 The Number Type

1. Number are 64 bits float
2. 11 bits are for the exponent
3.  $-2^{53}$  to  $+2^{53}$

## Question

```
1 [1, 2] == '1,2'
```

**What's the output?**

1. true
2. false

1 `[1, 2] == '1,2'`

## 7.2.14 Abstract Equality Comparison

“9. If `Type(x)` is `Object` and `Type(y)` is either `[...]`, return the result of the comparison `ToPrimitive(x) == y`.”

and then basically `[1, 2].toString()`.

```
1 <!-- console.log("foo") -->
```

## What's the output?

1. "foo"
2. parse error (because I'm a JS engine?)
3. no output?

Parsing is defined at B.1.3 HTML-like Comments.

Allow browsers that didn't understand the script tag to degrade gracefully

ex Netscape 1



## Allow parsing of HTML-like Comments #7802

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xtuc commented 29 seconds ago

Member



Choose one: is this a bug report or feature request?  
Bug I guess

### Input Code

```
<!-- test --->
```

### Expected Behavior

```
undefined
```

### Current Behavior

```
{ SyntaxError: res/ex-html-comment.js: Unexpected token (1:0)
> 1 | <!-- console.log("foo") -->
```

#### Assignees

No one—assign yourself

#### Labels

**pkg: babeln**

**spec-violation**

#### Projects

None yet

#### Milestone

No milestone

#### Notifications

Unsubscribe

You're receiving notificat

# Question

```
1 var t
2
3 t = 0
4 (1 + 1)
```

**What's the output?**

- 1
- 0 is not a function (because that's the truth)

```
1 var t
2
3 t = 0
4 (1 + 1)
```

## 11.9 Automatic Semicolon Insertion

No ASI because “[...] the parenthesized expression that begins the second line can be interpreted as an argument list for a function call.”









Everything is specified!

Don't let me commit on your project



**Thanks**

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