



链滴

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```
}, 5000)  
}
```

getCookie()是为了获取cookie, 在ertqwe()中传入user,接下来我们还发现了decodeURIComponent)以及decode_create(),后面的for循环里面处理得到key,最后会得到一下MD5加密的flag。

说白了这里唯一可以做文章的地方就是cookie了, 因为经过了几个函数我们都还没研究过。接下来继续跟踪具体函数吧。

| Name | Value | Do... | P... | Expire |
|------|---|--------|------|--------|
| user | UTw7PCxqe3FjcC420ThOjWtSUFYwbn99amIzbG0wI3MeHxUbZ1liZxQMWEFDX18EdUUDwwJd016B34WUIFWWTVoATEABHJ5P... | 123... | / | 2019-1 |

我们也只发现一个user

```
> function getCookie(cname) {  
  var name = cname + "=";  
  var ca = document.cookie.split(';');  
  for (var i = 0; i < ca.length; i++) {  
    var c = ca[i].trim();  
    if (c.indexOf(name) == 0) return c.substring(name.length, c.length);  
  }  
  return ""  
}  
  
undefined  
> getCookie("user")  
cookie  
"UTw7PCxqe3FjcC420ThOjWtSUFYwbn99amIzbG0wI3MeHxUbZ1liZxQMWEFDX18EdUUDwwJd016B34WUIFWWTVoATEABHJ5P322CwYgPTYSPj90FSUUFhgFl2ZnYnYhCRHTGRQPCcHKFIvEshXU1YCGQbDQ4FXEcXREo%2FBTzBxktbu6fbrB%2B%2Bps3nsLrP6dB%2FapJ3XnJnkjNPF0lnRjPpD7p7jzfaM1J0cxt%2FXkP%2FB%2B2I2C5vTqglE%3D"  
  
> cookie = getCookie("user")  
> "UTw7PCxqe3FjcC420ThOjWtSUFYwbn99amIzbG0wI3MeHxUbZ1liZxQMWEFDX18EdUUDwwJd016B34WUIFWWTVoATEABHJ5P322CwYgPTYSPj90FSUUFhgFl2ZnYnYhCRHTGRQPCcHKFIvEshXU1YCGQbDQ4FXEcXREo%2FBTzBxktbu6fbrB%2B%2Bps3nsLrP6dB%2FapJ3XnJnkjNPF0lnRjPpD7p7jzfaM1J0cxt%2FXkP%2FB%2B2I2C5vTqglE%3D"  
> c = decodeURIComponent(cookie)  
> "UTw7PCxqe3FjcC420ThOjWtSUFYwbn99amIzbG0wI3MeHxUbZ1liZxQMWEFDX18EdUUDwwJd016B34WUIFWWTVoATEABHJ5P322CwYgPTYSPj90FSUUFhgFl2ZnYnYhCRHTGRQPCcHKFIvEshXU1YCGQbDQ4FXEcXREo/BTzBxktbu6fbrB+H+ps3nsLrP6dCs0Lg8fj1/+8y3+/apJ3XnJnkjNPF0lnRjPpD7p7jzfaM1J0cxt/XkP/B+I2C5vTqglE+~"  
> rcookie = decode_create(c)  
> "O:5:"human":10:{s:8:"xueliang";i:911;s:5:"neili";i:947;s:5:"lidao";i:62;s:6:"dingli";i:86;s:7:"waigong";i:0;s:7:"jingyan";i:0;s:6:"yelian";i:0;s:5:"money";i:0;s:4:"flag";s:1:"0"}"
```

```
O:5:"human":10:{s:8:"xueliang";i:911;s:5:"neili";i:947;s:5:"lidao";i:62;s:6:"dingli";i:86;s:7:"waigong";i:0;s:7:"jingyan";i:0;s:6:"yelian";i:0;s:5:"money";i:0;s:4:"flag";s:1:"0"};
```

这里看到了最后得到的是cookie反序列化后的字符串, 但同时我们发现money为0, 太穷了!!!
怎么才能有钱呢?

我们先来看看for循环哦

```

8: "s:7:"waigong""
9: "i:0"
10: "s:7:"neigong""
11: "i:0"
12: "s:7:"jingyan""
13: "i:0"
14: "s:6:"yelian""
15: "i:0"
16: "s:5:"money""
17: "i:0"
18: "s:4:"flag""
19: "s:1:"0""
20: "}"
length: 21
  __proto__: Array(0)
> c[18].indexOf("flag")
< 5
> c[19]
< "s:1:"0""
> c[19].split(":")
< ▼ (3) ["s", "1", ""0"] ⓘ
  0: "s"
  1: "1"
  2: ""0""
  length: 3
  __proto__: Array(0)
> c[19].split(":")[2]
< ""0""

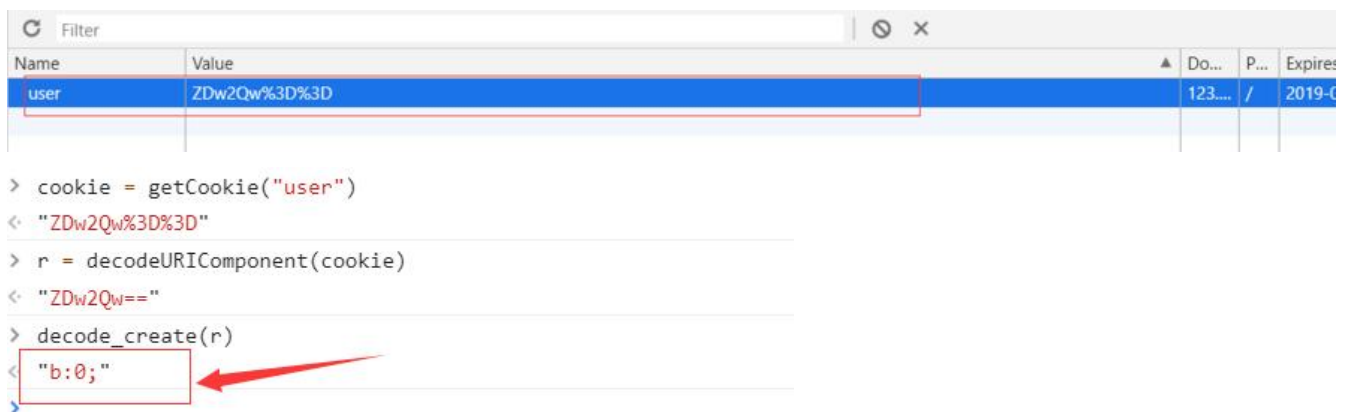
```

这里的意思也就是即使你把这段代码直接跑也会得到一个MD5，只是为空值。显然不是flag。

现在我们来看一下直接去买装备是啥情况！



买不起，我们打开cookie看一下。



关键字段，也就是这里面都是钱啊!!! 知道为什么这么穷了吧，因为你没钱!

现在的目的很明显，就是要有钱!

```
"money";i:0;
```

现在目标就转为逆向加密。

`encodeURIComponent()`函数已经提供给我们，但是我们还想要有一个`encode_create()`那就更完美了。

可是天上哪有掉馅饼的好事呢?

现在进入`decode_create()`分析阶段。

```
function decode_create(temp) {
  var base = new Base64(); // Base64
  var result = base.decode(temp); //decode()
  var result3 = "";
  for (i = 0; i < result.length; i++) {
    var num = result[i].charCodeAt(); // decode后进行按位获取Ascii值
    num = num ^ i; // 与位置进行异或
    num = num - ((i % 10) + 2); // 进行运算
    result3 += String.fromCharCode(num) // 最后转为字符
  }
  return result3
}
```

下面开始编写加密函数(重点!!):

```
function encode_create(temp) {
  var result3 = "";
  for (i = 0; i < temp.length; i++) {
    // 将字符转为Unicode编码
    var num = temp.charCodeAt(i);
    num = num + ((i % 10) + 2);
    num = num ^ i;
    result3 += String.fromCharCode(num);
  }
  var base = new Base64();
  var result1 = base.encode(result3);
  return result1;
}
```

下面我们就开始变有钱的操作!

```
> function encode_create(temp) {
  var result3 = "";
  for (i = 0; i < temp.length; i++) {
    // 将字符转为Unicode编码
    var num = temp.charCodeAt(i);
    num = num + ((i % 10) + 2);
    num = num ^ i;
    result3 += String.fromCharCode(num);
  }
  var base = new Base64();
  var result1 = base.encode(result3);
  return result1;
}
> undefined
> encode_create('0:5:"human":10:{s:8:"xueliang";i:928;s:5:"neili";i:790;s:5:"lida0";i:51;s:6:"dingli";i:72;s:7:"waigong";i:0;s:7:"neigong";i:0;s:7:"jingyan";i:0;s:6:"yelian";i:0;s:5:"money";i:1000000000;s:4:"flag";i:1000000000;s:4:"flag"}')
"UTu7PCxq3Fjc420ThDuo1rUjBwMGSvFhPpc2xtMClzhBaHgGZYecUDFhBQ15FBHVFdGk3AH9legd+F13RV1k1aEaAAV1eT92dggmID020T4/dBU1FBdkHy9mZ222IQkTEskUD0AnByhSLxEOv13WAhkDGv00BVxHF0RkPvU8u4HDHkMw67DqcO2w6stH6HDvKmu43Dp8KmuwrgRw7HDuHDu1w7/DrSkYv5/Dr80awqTCncOXupzCecDkwzDk80Fu500nc0Ruo7Ck80Du67C18K1uo3C1PK1u0bChsKCu0LCjskDu7ndh804u0LCgskawqzCs9K1uq3DrSkBurvCgs07u7TDrHDu6TCj0s="
> encode_create('0:5:"human":10:{s:8:"xueliang";i:928;s:5:"neili";i:790;s:5:"lida0";i:51;s:6:"dingli";i:72;s:7:"waigong";i:0;s:7:"neigong";i:0;s:7:"jingyan";i:0;s:6:"yelian";i:0;s:5:"money";i:1000000000;s:4:"flag";i:1000000000;s:4:"flag"}')
"UTu7PCxq3Fjc420ThDuo1rUjBwMGSvFhPpc2xtMClzhBaHgGZYecUDFhBQ15FBHVFdGk3AH9legd+F13RV1k1aEaAAV1eT92dggmID020T4/dBU1FBdkHy9mZ222IQkTEskUD0AnByhSLxEOv13WAhkDGv00BVxHF0RkPvU8u4HDHkMw67DqcO2w6stH6HDvKmu43Dp8KmuwrgRw7HDuHDu1w7/DrSkYv5/Dr80awqTCncOXupzCecDkwzDk80Fu500nc0Ruo7Ck80Du67C18K1uo3C1PK1u0bChsKCu0LCjskDu7ndh804u0LCgskawqzCs9K1uq3DrSkBurvCgs07u7TDrHDu6TCj0s="
> encodeURIComponent(cookie)
"UTu7PCxq3Fjc420ThDuo1rUjBwMGSvFhPpc2xtMClzhBaHgGZYecUDFhBQ15FBHVFdGk3AH9legd28F13RV1k1aEaAAV1eT92dggmID020T4N2f0BU1FBdkHy9mZ222IQkTEskUD0AnByhSLxEOv13WAhkDGv00BVxHF0RkPvU8u4HDHkMw67DqcO2w6stH6HDvKmu43Dp8KmuwrgRw7HDuHDu1w7/DrSkYv5/Dr80awqTCncOXupzCecDkwzDk80Fu500nc0Ruo7Ck80Du67C18K1uo3C1PK1u0bChsKCu0LCjskDu7ndh804u0LCgskawqzCs9K1uq3DrSkBurvCgs07u7TDrHDu6TCj0s%30"
```

但是我们发现还是买不了???



查看cookie发现没有修改成功!

| Name | Value |
|------|--------------|
| user | ZDw2Qw%3D%3D |
| | ??? |

仔细思考发现刚才的Base64我们没有跟踪进去看，肯定是它搞的鬼!

```
// public method for decoding
this.decode = function (input) {
    var output = "";
    var chr1, chr2, chr3;
    var enc1, enc2, enc3, enc4;
    var i = 0;
    input = input.replace(/[^A-Za-z0-9+\|\/\=]/g, "");
    while (i < input.length) {
        enc1 = _keyStr.indexOf(input.charAt(i++));
        enc2 = _keyStr.indexOf(input.charAt(i++));
        enc3 = _keyStr.indexOf(input.charAt(i++));
        enc4 = _keyStr.indexOf(input.charAt(i++));
        chr1 = (enc1 << 2) | (enc2 >> 4);
        chr2 = ((enc2 & 15) << 4) | (enc3 >> 2);
        chr3 = ((enc3 & 3) << 6) | enc4;
        output = output + String.fromCharCode(chr1);
        if (enc3 != 64) {
            output = output + String.fromCharCode(chr2);
        }
        if (enc4 != 64) {
            output = output + String.fromCharCode(chr3);
        }
    }
    //output = _utf8_decode(output);
    return output;
}
```

在decode这个方法中，我们发现很诡异的地方这里被注释掉了，但是在encode方法中是这样的。


```

// public method for encoding
this.encode = function (input) {
    var output = "";
    var chr1, chr2, chr3, enc1, enc2, enc3, enc4;
    var i = 0;
    input = _utf8_encode(input);
    while (i < input.length) {
        chr1 = input.charCodeAt(i++);
        chr2 = input.charCodeAt(i++);
        chr3 = input.charCodeAt(i++);
        enc1 = chr1 >> 2;
        enc2 = ((chr1 & 3) << 4) | (chr2 >> 4);
        enc3 = ((chr2 & 15) << 2) | (chr3 >> 6);
        enc4 = chr3 & 63;
        if (isNaN(chr2)) {
            enc3 = enc4 = 64;
        } else if (isNaN(chr3)) {
            enc4 = 64;
        }
        output = output +
            _keyStr.charAt(enc1) + _keyStr.charAt(enc2) +
            _keyStr.charAt(enc3) + _keyStr.charAt(enc4);
    }
    return output;
}

```

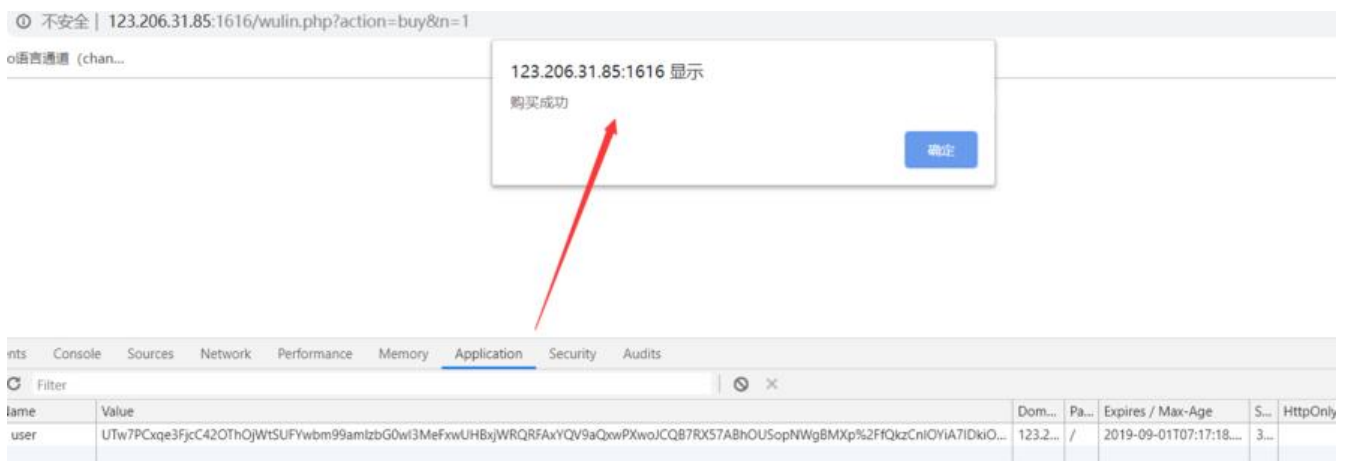
所以明白了吧，我们现在的目的就要把这里注释掉，然后覆盖一下这个函数！

```

> function encode_create(temp) {
    var result3 = "";
    for (i = 0; i < temp.length; i++) {
        // 将字符串的每个字符编码
        var num = temp.charCodeAt(i);
        num = num + ((i % 10) * 2);
        num = num ^ i;
        result3 += String.fromCharCode(num);
    }
    var base = new Base64();
    var result1 = base.encode(result3);
    return result1;
}
undefined
> encode_create('0:5:"human":10:
[s:8:"xuexiang";i:928;s:5:"hell";i:790;s:5:"lidao";i:51;s:6:"dingli";i:72;s:7:"waigong";i:0;s:7:"weigong";i:0;s:7:"jingyan";i:0;s:6:"yelian";i:0;s:5:"money";i:1000000000;s:4:"flag";s:1:"0"];')
"UTw7PCxqe3Fjc420ThOjWtSUFYwbm99am1zbG0w13MeFwXUHBYWRQRFAYQV9aQxwPXwoJCQB7RX57A8hOUSopNwWgBMXp%2FQkzCnIOYIA7IDkiO...
PF0BnHjP07pe111Ihoacg06Dvcf4gokagpClre6Bu4L790z519L"
> c = encode_create('0:5:"human":10:
[s:8:"xuexiang";i:928;s:5:"hell";i:790;s:5:"lidao";i:51;s:6:"dingli";i:72;s:7:"waigong";i:0;s:7:"weigong";i:0;s:7:"jingyan";i:0;s:6:"yelian";i:0;s:5:"money";i:1000000000;s:4:"flag";s:1:"0"];')
"UTw7PCxqe3Fjc420ThOjWtSUFYwbm99am1zbG0w13MeFwXUHBYWRQRFAYQV9aQxwPXwoJCQB7RX57A8hOUSopNwWgBMXp%2FQkzCnIOYIA7IDkiO...
PF0BnHjP07pe111Ihoacg06Dvcf4gokagpClre6Bu4L790z519L"
> encodeURIComponent(c)
"UTw7PCxqe3Fjc420ThOjWtSUFYwbm99am1zbG0w13MeFwXUHBYWRQRFAYQV9aQxwPXwoJCQB7RX57A8hOUSopNwWgBMXp%2FQkzCnIOYIA7IDkiO...
BkZFay33Xn3nkjUP0BnHjP07pe111Ihoacg06Dvcf4gokagpClre6Bu4L790z519L"

```

现在购买成功了



然后练功!



讨伐就成功拿到flag!!!

