JAVASCRIPT CHARTS

It’s well-known that the best way to get familiar with a system is to practice on it. In order to modify the interface of our plugin and visualize our data in a friendly and wonderful way, CSS, PHP, and Javascript are very useful.

On the learning process, I find a very useful tool to convert your data table into a lively and vivid chart.

Let me introduce JS charts to all of you.

JS Charts is a Javascript class used to draw charts using entirely client-side scripting. No additional plugins are necessary. Just include our scripts, prepare your chart data in XML, JSON or Javascript Array, and your chart is ready. JS Charts allows you to draw different types of charts, like bars, pie charts or simple lines, and it is highly customizable.

Firstly, let us begin with the header of course.

There is only one Javascript file to be included, it contains the main code and canvas functions compatible with Internet Explorer.

<script type="text/javascript" src="jscharts.js"></script>

The second step is to prepare the container which will hold one chart. This can be a simple <DIV>tag. It is mandatory for this tag to have a unique ID set.
<div id="chartcontainer">This is just a replacement in case Javascript is not available or used for SEO purposes</div>

The container's content will be replaced by JS Charts.

Next, a few lines Javascript code is needed for your first chart. First, the chart data are prepared, a simple array contains other arrays, each of two elements. Each of these two-element arrays will represent one point in a line graphic, or one bar in a bar chart, or a pie section in a pie chart.

These data are stored in the myData variable as in the following example:

```javascript
var myData = new Array([[10, 20], [15, 10], [20, 30], [25, 10], [30, 5]]);
var myChart = new JSChart('chartcontainer', 'line');
myChart.setDataArray(myData);
myChart.draw();
```

When using multiple data series in a line chart, you might want different settings for each line (e.g. different colors). This will require associating the data set with
the customization method using an id. The `setDataArray` can be called using a second argument which will be the data set id. The same id must be used when calling e.g. `setLineColor`, `setLineWidth` or `setLineOpacity` to set a property for the specific data set. In the following example the first line id is used to colorize the first data set and the second line id is used to set the width of the line for the second data set. Also a tooltip is defined for the line with the first line id (you can read more about the tooltips in Reference).

We can also change the type of charts to bar or pie, showing as the following.

![Bar Chart](image)

![Pie Chart](image)

JS Charts is also a highly customizable Javascript library. There are several API functions for you to customize your charts. You can customize the charts: using the built-in Javascript functions and/or using the `optionset` node in the XML or JSON files.