

## Redmine - Defect #4787

### Gantt to PNG - CJK (Chinese, Japanese and Korean) characters appear as ?

2010-02-10 08:44 - Jeffrey Jones

<b>Status:</b>	Closed	<b>Start date:</b>	2010-02-10
<b>Priority:</b>	Normal	<b>Due date:</b>	
<b>Assignee:</b>	Toshi MARUYAMA	<b>% Done:</b>	100%
<b>Category:</b>	Gantt	<b>Estimated time:</b>	0.00 hour
<b>Target version:</b>	2.2.0	<b>Affected version:</b>	
<b>Resolution:</b>	Fixed		
<b>Description</b>			
<p>When exporting a gantt chart to png format all Japanese (hiragana,katakana and kanji) characters are replaced with ? characters.</p> <p>This is using RMagick 2.12.2 and the libmagick9-dev provided with Ubuntu 9.10.</p> <p>Being able to export to PNG would relieve some of the problems we are facing with the inability to export to PDF (As discussed in issue #61 )</p> <p>(Also would it be useful to add an "Exporters" category? I am not sure what to file this under)</p>			
<b>Related issues:</b>			
Related to Redmine - Defect # 6505: PDF export broken with Japanese (Gantt an...		<b>Closed</b>	<b>2010-09-27</b>
Related to Redmine - Defect # 61: Broken character encoding in pdf export		<b>Closed</b>	
Related to Redmine - Patch # 3231: patch for broken character problem on png-...		<b>Closed</b>	<b>2009-04-23</b>
Related to Redmine - Feature # 69: Textilized description in PDF		<b>Closed</b>	
Related to Redmine - Feature # 5638: Use Bundler (Gemfile) for gem management		<b>Closed</b>	<b>2010-06-02</b>
Related to Redmine - Defect # 13781: CJK(Chinese/Japanese/Korean) characters ...		<b>Closed</b>	
Duplicated by Redmine - Defect # 6506: Gantt chart export to PDF/PNG works in...		<b>Closed</b>	<b>2010-09-27</b>

#### Associated revisions

##### Revision 10890 - 2012-11-28 11:11 - Toshi MARUYAMA

add configuration of RMagick font for CJK (Chinese, Japanese and Korean) (#4787)

Contributed by Jun NAITOH.

##### Revision 10892 - 2012-11-28 12:00 - Toshi MARUYAMA

fix comment of RMagick font configuration (#4787)

#### History

##### #1 - 2010-02-16 10:00 - Jeffrey Jones

- % Done changed from 0 to 10

Looks like this is a font issue.

I edited /lib/redmine/helpers/gantt.rb and hacked in the following

```
gc = Magick::Draw.new
```

```
gc.font = "/usr/share/fonts/truetype/msttcorefonts/gothic.ttf" # New Line - Explicitly declare font
# Subjects
```

This is an ugly hard-coded hack that points to a font that I know for sure is UTF-8 Japanese character compatible and it works.

So the question now is how to make this something that can be merged into redmine itself and works on all platforms.

Maybe we could make an administration option that allows us to select the fonts we desire for our exports? (When using PDF/PNG?)

## **#2 - 2010-03-22 11:41 - Ki Won Kim**

Symptoms are the same, and I was modified gantt.rb by your hacked code.

thanks a lot.

Jeffrey Jones wrote:

*When exporting a gantt chart to png format all Japanese (hiragana,katakana and kanji) characters are replaced with ? characters.*

*This is using RMagick 2.12.2 and the libmagick9-dev provided with Ubuntu 9.10.*

*Being able to export to PNG would relieve some of the problems we are facing with the inability to export to PDF (As discussed in issue #61 )*

*(Also would it be useful to add an "Exporters" category? I am not sure what to file this under)*

## **#3 - 2010-10-03 15:07 - Mischa The Evil**

- Category set to Gantt

## **#4 - 2011-04-09 12:43 - Toshi MARUYAMA**

- Subject changed from Gantt to PNG - Japanese characters appear as ? to Gantt to PNG - CJK (Chinese, Japanese and Korean) characters appear as ?

## **#5 - 2012-01-25 05:59 - Namho Kim**

- File gantt\_korean.png added

That's right. For example Gantt include Korean like belows.

## **#6 - 2012-01-25 06:01 - Namho Kim**

That's right. For example Gantt include Korean like belows.

gantt\_korean.png

## **#7 - 2012-02-01 16:30 - Jun NAITOH**

- File png\_rmagick\_font\_r8745.patch added

- File rmagick\_font.png added

This issue is font setting problem.

I wrote selectable RMagick font patch.

This patch add RMagick font selector of Display tab in Setting.

If you want to show Japanese, so please select Japanese Font.

rmagick\_font.png

I tested on RMagick 2.13.1 on CentOS 6, RMagick 2.12.0 on Windows XP.

**#8 - 2012-02-01 16:36 - Toshi MARUYAMA**

- Assignee set to Toshi MARUYAMA

**#9 - 2012-02-01 17:58 - Etienne Massip**

Please don't make this a new setting, just force the ~~police~~font to what would fit well if possible?

**#10 - 2012-02-02 00:08 - Toshi MARUYAMA**

- Assignee deleted (Toshi MARUYAMA)

**#11 - 2012-02-02 03:17 - Toshi MARUYAMA**

- File user-pref.png added

- File user-pref-r8745.patch added

This is a patch using user preference.

user-pref.png

**#12 - 2012-02-02 09:44 - Etienne Massip**

I can't see why a font would be a user preference?? This should be automatic, who wants to select a specific font to export a chart? I just want to click and get my Gantt chart exported as a image as it rendered in browser, period.

Please don't add too much complexity.

**#13 - 2012-02-02 10:35 - Toshi MARUYAMA**

Etienne Massip wrote:

| *This should be automatic*

There is no standard font in Japanese.

- Windows: MS Mincho, MS Gothic
- MacOS: HIRAGINO
- Linux: Nothing

Unicode has Unified problem.

[http://en.wikipedia.org/wiki/CJK\\_Unified\\_Ideographs](http://en.wikipedia.org/wiki/CJK_Unified_Ideographs)

So, CJK font cannot be defined automatically.

**#14 - 2012-02-02 10:46 - Toshi MARUYAMA**

On Redmine 1.3, CJK PDF fonts are hard-coded.

source:tags/1.3.0/lib/redmine/export/pdf.rb#L52

Redmine 1.3 uses **non embedded fonts** for CJK PDF.

So, PDF reader uses alternate fonts if there is no fonts on **client**.

But, rmagick processes on **server**.

So, we cannot hard-coded and defined fonts at locale files (config/locales/ja.yml).

**#15 - 2012-02-02 11:07 - Etienne Massip**

Can't you add a setting to embed fonts into exported file?

**#16 - 2012-02-02 11:14 - Toshi MARUYAMA**

Etienne Massip wrote:

| *Can't you add a setting to embed fonts into exported file?*

It is difficult that user/administrator finds fonts name on server.

On Note-12 attachment:user-pref.png, font name is "IPAGothic-Regular".

**#17 - 2012-02-09 04:00 - Namho Kim**

- File redmine-gantt\_kr.png added

Korean is OK, using the above patch.

redmine-gantt\_kr.png

**#18 - 2012-02-12 16:25 - Jun NAITOH**

Toshi MARUYAMA wrote:

| *This is a patch using user preference.*

I'm checked. I think this patch is better than my patch.

**#19 - 2012-02-25 04:32 - Jun NAITOH**

- File `png_rmagick_font_path_r8987.patch` added

Etienne Massip wrote:

| *Please don't add too much complexity.*

OK. I tried another approach.

This patch add a configurable path of RMagick in configuration.yml.

**#20 - 2012-11-15 16:57 - Go MAEDA**

Current PNG output is of no use in CJK. Font name must be set to address the problem but we cannot know what font is installed in a system because standard CJK font is different by operating system.

NAITOH's patch (attachment:png\_rmagick\_font\_path\_r8987.patch) seems smart approach to deal with the problem because there's no ui change.

It wishes strongly that the patch is merged to trunk to make Redmine more useful.

**#21 - 2012-11-19 13:36 - Toshi MARUYAMA**

- File `png_rmagick_font_path_r10851.patch` added

This is a patch of note-19 attachment:png\_rmagick\_font\_path\_r8987.patch rebased to trunk r10851.

You can apply it to 2.1-stable r10848 (2.1.3).

**#22 - 2012-11-28 13:31 - Toshi MARUYAMA**

- Status changed from *New* to *Closed*

- Assignee set to *Toshi MARUYAMA*

- Target version set to *2.2.0*

- % Done changed from *10* to *100*

- Resolution set to *Fixed*

I have added comment to note-21 patch and committed in trunk r10890 and r10892.

**#23 - 2014-08-29 13:27 - Daniel Felix**

Etienne Massip wrote:

| *Please don't make this a new setting, just force the ~~pdf~~font to what would fit well if possible?*

Well I would agree to that point. Our users won't be able to easily determine the right font on languages they don't even know.

**#24 - 2014-08-30 10:46 - Toshi MARUYAMA**

- Related to Defect #13781: CJK(Chinese/Japanese/Korean) characters are not shown in PDF on non CJK locales added

<b>Files</b>			
gantt_korean.png	23.3 KB	2012-01-25	Namho Kim
png_rmagick_font_r8745.patch	2.01 KB	2012-02-01	Jun NAITOH
rmagick_font.png	23.8 KB	2012-02-01	Jun NAITOH
user-pref.png	33.9 KB	2012-02-02	Toshi MARUYAMA
user-pref-r8745.patch	3.03 KB	2012-02-02	Toshi MARUYAMA
redmine-gantt_kr.png	50.1 KB	2012-02-09	Namho Kim
png_rmagick_font_path_r8987.patch	1.07 KB	2012-02-25	Jun NAITOH
png_rmagick_font_path_r10851.patch	1.3 KB	2012-11-19	Toshi MARUYAMA