



# Ruby on Rails Meets the World of Enterprise Applications

Dan Mcweeney  
Solution Architect  
Colgate-Palmolive

TS-91440

# GOOOOOOOOOOOAAAAAALL!

Learn how and why we attached  
Ruby on Rails to an SAP system;  
Find out the pros and cons and  
learn where you can help

# Stuff I Will Talk About

What the Heck is SAP


Who Uses It

Our Problem

Why Rails

Architecture

Code and Demo

- 
- Big
  - Does lots
  - A bit dreary
  - Enterprise





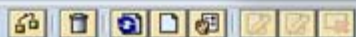
### Enter plan data

Close navigation Planning profile Global planning sequences Set Variables

- Planning areas
  - Flash Loader
  - Loader
  - Flex Planning Resources
    - Plan Resources
      - Ad hoc package
      - Flex Test Requirements
      - Plan Requirements
    - test

Characteristic	Characteristic Value	Description

**Toolbar**



**Transaction Codes**

Calendar year / week	Flex Projects	Flex resource requir	Flex User	Flex GUID	Flex PAID	planned hours
01.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
02.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
03.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
04.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
05.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
06.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
07.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
08.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
09.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
10.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
11.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
12.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
13.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
14.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
15.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
16.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
17.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
18.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
19.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
20.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
21.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
22.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
23.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
24.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
25.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
26.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
27.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
28.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
29.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
30.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
31.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
32.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
33.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
34.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100
35.2007	1	1	USDWM01	DBEFD75333BE98F1AC33005056C00008	DBEFD74A6939CDF1AC33005056C00008	100

**Keyboard Interaction**

**Anheuser-Busch Co.**  
**The Boston Beer Company**  
**General Mills**  
**Tyson Foods Inc**  
**De' Longhi**  
**H.J. Heinz Company**  
**Nabisco**  
**Nestlé**  
**Starbucks Corp.**  
**Bose Corp.**  
**Burton Snowboards**  
**Oakley**  
**JBL-Professional**  
**Mercedes Benz**  
**Peugeot**  
**DaimlerChrysler**

**Delta Air Lines**  
**Air France**  
**Ryanair**  
**Lufthansa**  
**Global Electric**  
**Adidas**  
**Sony**  
**Whirlpool**  
**Cole Haan**  
**Adaptec**  
**Microsoft**  
**HP**  
**Nvidia**  
**Adobe**  
**7-Eleven**  
**J.Crew**





Albert from Chicago  
EU NOT LONG  
DO LA ESKI  
12-20-06

Benny Wright  
10/1/00

Sept 2000  
Mason & Betty Hamilton  
Miyuki Senoie

WILLIAMS  
DATE: 06-21-2006  
Moses

10/1/00

Joe + Betty  
10/1/00

3/1/00  
Flora  
10/1/00

Betty Nancy  
Bridget  
June 2000

JONES'S  
10/1/00

12-24-00  
10/1/00

BEBE  
10/1/00

11-2-00  
10/1/00

10/1/00

10/1/00

FROM  
ST. LUCIA, N.Z.  
22/8/2000

10/1/00

INCH DE VES  
NACHO  
JR  
30-11-93

UNCLE TERRY  
TERRY  
LINDA  
Rockford, IL

10/1/00

10/1/00

IN ME  
OF  
LARRY  
Polina

2/1/00

Nathan  
10/1/00

10/1/00

RENEZIO  
SCHILLING  
10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

300  
10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

JENNIFER GREGORY  
WELLS  
10/1/00

10/1/00

10/1/00

10/1/00

100

10/1/00

10/1/00

JENNIFER SCOTT  
CANADIAN GIRLS  
10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

The Butt  
10/1/00

Isiah & Alyssa  
Gomez-Gabard  
CHANDLER, AZ  
10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00

10/1/00



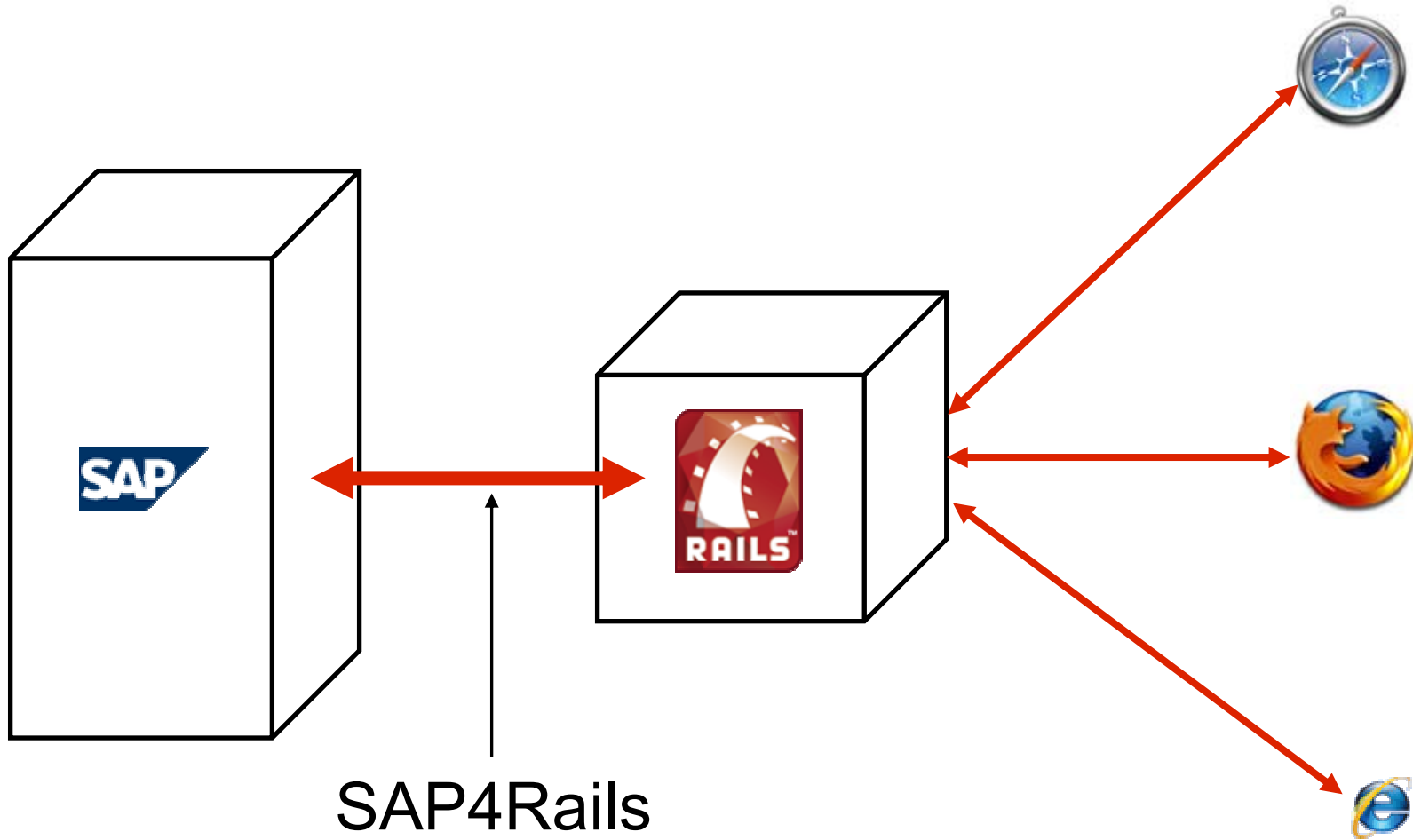
- 
- The image shows two parking meters side-by-side on a paved surface. Both meters have a red circular sign that says "TIME EXPIRED" in white capital letters. The meters are made of a dark material with a lighter-colored top section. The background is a dark asphalt surface with some small, light-colored debris.
- People
  - Projects
  - Timing
  - Visual

REGULATED PARKING  
DURING HOURS SHOWN ON METERS

duncan industries



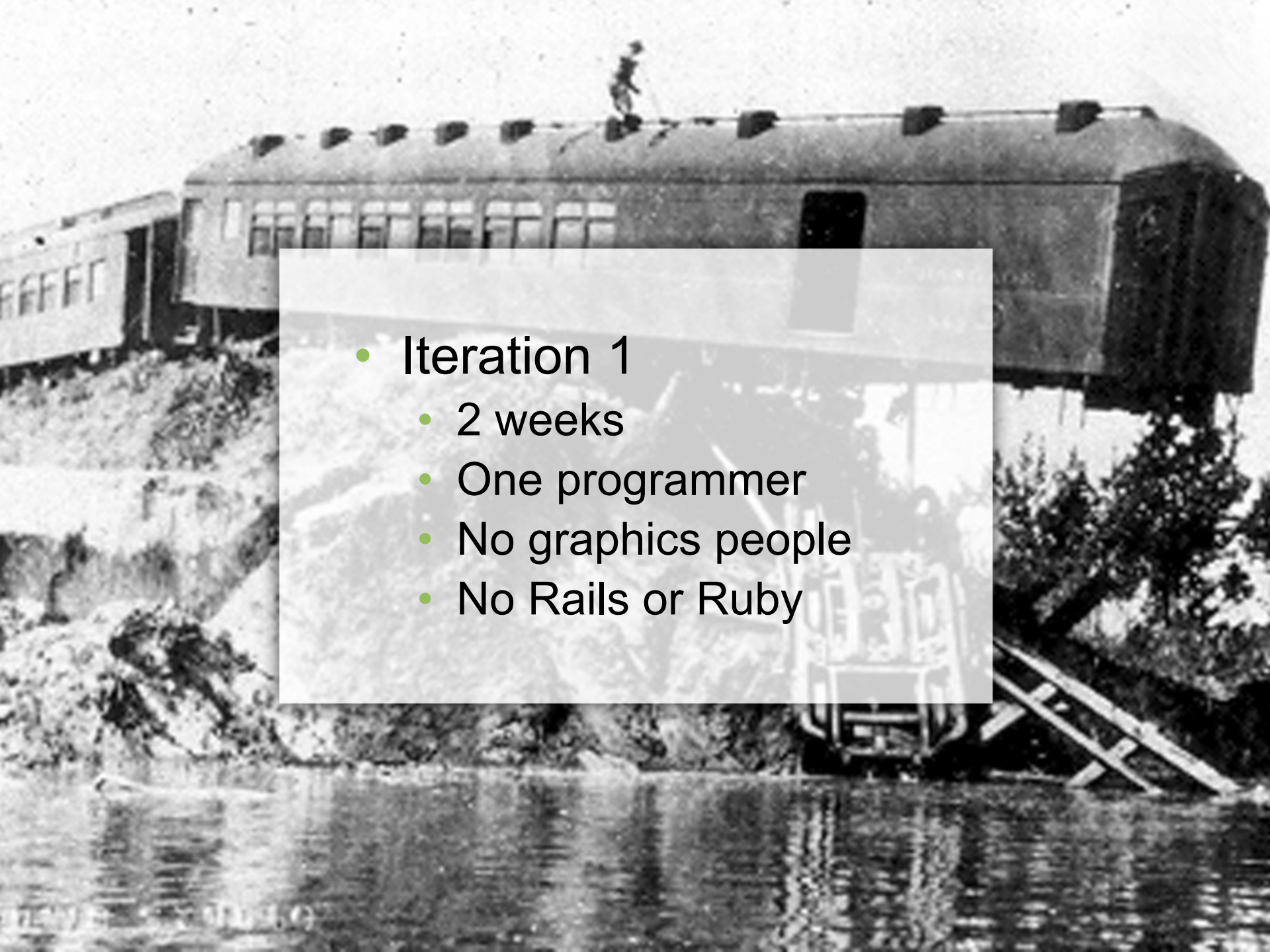
- 
- A photograph of a railway track with a semi-transparent white box overlaid in the center containing a bulleted list. The background shows a clear blue sky, utility poles, and some buildings in the distance.
- Development Speed
  - UI
  - Learn
  - Web 2.0!







<code />



- Iteration 1
  - 2 weeks
  - One programmer
  - No graphics people
  - No Rails or Ruby






YOUR LOGO  
HERE

# Iteration 2



- 
- A blurred high-speed train is shown in a tunnel, moving from left to right. The train is white with dark accents. The tunnel walls are dark, and there are bright lights on the ceiling. A yellow safety line is visible on the ground in the foreground. A semi-transparent white box is overlaid on the right side of the image, containing a bulleted list.
- Iteration 2
    - 2weeks
    - One programmer
    - Still no graphics
    - Some Rails/Ruby!



```
def addUser

  newResource = ProjectResource.add_resource(
    params[:id], params[:resourceType],
    params[:user].split('_')[1],
    params[:requirementID] )

  render(:update) { |page|
    page.insert_html :bottom,
      "resources_#{params[:requirementID]}",
      :partial => "resource",
      :locals => { :resource => newResource }
  }
end
```

```
def self.add_resource(projectID, resourceType, userName, uuid)
  ProjectResource.Z_RP_ADD_RESOURCE.reset()
  ProjectResource.Z_RP_ADD_RESOURCE.FLEX_PROJ = projectID
  ProjectResource.Z_RP_ADD_RESOURCE.FLEX_TYPE = resourceType
  ProjectResource.Z_RP_ADD_RESOURCE.FLEX_USER = userName
  ProjectResource.Z_RP_ADD_RESOURCE.ID = uuid
  ProjectResource.Z_RP_ADD_RESOURCE.call()
  table = []
  ProjectResource.Z_RP_ADD_RESOURCE.NEWREQ.rows().each{|row|
    table.push(ProjectResource.new(row['ID'].strip,
      row['FLEX_PROJ'].strip,
      row['FLEX_TYPE'].strip,
      row['STARTWEEK'][4,2].to_i,
      row['ENDWEEK'][4,2].to_i,
      row['FLEX_USER'].strip,
      row['PARENTID'].strip))
  }
  ProjectResource.Z_RP_ADD_RESOURCE.rfc.close()
  table[0]
end
```

```
require_gem "sap4rails"  
  
class ProjectResource < SAP4Rails::Base  
  function_module :Z_RP_GET_RESOURCE_DETAILS,  
    :Z_RP_ADD_RESOURCE, :Z_RP_DELETE,  
    :Z_RP_CHANGE_RESOURCE  
  
end
```



# Useful Info

- SDN SAP Developer Network (<http://sdn.sap.com>)
- Ruby on Rails (<http://www.rubyonrails.org>)
- SAP for Rails (<http://raa.ruby-lang.org/project/sap4rails>)

# Great Photos

jasoncartwright—<http://www.flickr.com/photos/jasoncartwright/138205239/>  
danielgreene—<http://www.flickr.com/photos/danielgreene/319689254/>  
swirlingthoughts—<http://www.flickr.com/photos/swirlingthoughts/235667768/>  
kd5ftn—<http://www.flickr.com/photos/kd5ftn/194248784/>  
kb35—<http://www.flickr.com/photos/kb35/361901328/>  
mikehunter—<http://www.flickr.com/photos/mikehunter/433302528/>  
birdjsb—<http://www.flickr.com/photos/birdjsb/422765102/>  
michaelsarver—<http://www.flickr.com/photos/michaelsarver/108557419/>



# Q&A

<code />





# Ruby on Rails Meets the World of Enterprise Applications

Dan Mcweeney  
Solution Architect  
Colgate-Palmolive

TS-91440