

# Some extensions to Semantic MediaWiki

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(creator of, or contributor to, all the extensions covered here)

“Semantic wiki mini-series” session 3

Dec. 11, 2008

Objective: to simplify and enable the adding, editing, browsing, displaying, importing and exporting of data.

Approach: completely hide semantic nature of the data from users

- If users can modify and interact with the data without knowing that it's either semantic or a wiki, we have fully succeeded.

Adding and editing data:

Semantic Forms

# Wiki page with infobox

[page](#) [discussion](#) [edit with form](#) [edit](#) [history](#)

## KDD 2008

General Chair: Ying Li (Microsoft Corporation)  
Program Co-Chairs: Bing Liu (University of Illinois at Chicago)  
                          Sunita Sarawagi (Computer Science and Engineering, IIT Bombay)  
Industrial & Government Track Co-Chairs: Volker Tresp (Siemens AG)  
  Chris Volinsky (AT&T Labs - Research)  
Local Arrangements Co-Chairs: Jeff Jonas (IBM Corporation)  
  Teresa Mah (Microsoft Corporation)  
Panel Chair: Alexander Tushilin (New York University)  
Tutorial Chair: Philip S. Yu (IBM T.J. Watson Research Center)  
Workshop Chair: Eamonn Keogh (University of California, Riverside)  
Sponsorship Chair: Karl Rexer (Rexer Analytics)  
Best Paper Award Chair: Christos Faloutsos (Carnegie Mellon University)

This CfP was obtained from [WikiCFP](#)

KDD 2008	
The 14th ACM SIGKDD International Conference on Knowledge Discovery and Data Mining	
Start	Aug 24, 2008 ( <a href="#">iCal</a> )
End	Aug 27, 2008
Homepage:	<a href="http://www.sigkdd.org/kdd2008">http://www.sigkdd.org/kdd2008</a>
Location	
City:	<a href="#">Las Vegas</a>
Country:	<a href="#">USA</a>
Important dates	
Abstracts due:	Feb 22, 2008
Submissions due:	Feb 29, 2008
Notification:	May 25, 2008













Source: [openresearch.org](http://openresearch.org)

# Source code of page (uses a template)

page discussion edit with form edit history

## Editing KDD 2008

**Warning:** You are not logged in. Your IP address will be recorded in this page's edit history.

**B**            

```
{{Event
| Acronym = KDD 2008
| Title = The 14th ACM SIGKDD International Conference on Knowledge Discovery and Data Mining
| Type = Conference
| Series =
| Field = Database
| Homepage = www.sigkdd.org/kdd2008
| Start date = Aug 24, 2008
| End date = Aug 27, 2008
| City= Las Vegas
| State =
| Country = USA
| Abstract deadline = Feb 22, 2008
| Submission deadline = Feb 29, 2008
| Notification = May 25, 2008
| Camera ready =
}}
```

<pre>  
General Chair: Ying Li (Microsoft Corporation)  
Program Co-Chairs: Bing Liu (University of Illinois at Chicago)

Source: openresearch.org

# Form for page

[page](#) [discussion](#) [edit with form](#) [edit](#) [history](#)

## Edit Event: KDD 2008

**Warning:** You are not logged in. Your IP address will be recorded in this page's edit history.

[General Information](#) [Important Dates](#) [Additional Data](#)

|                    |   |   |
|--------------------|---|---|
| <b>Acronym:</b>    | <input type="text" value="KDD 2008"/>   | Acronym of the event such as "ESWC 2009"  |
| <b>Title:</b>      | <input type="text" value="The 14th ACM SIGKDD International Conf"/>                                   | Full title of the given event, e.g. "5th European Semantic Web Conference"  |
| <b>Series:</b>     | <input type="text"/>  | Abbreviation of event series, in case the event belongs to a continuing series  |
| <b>Type:</b>       | <input type="text" value="Conference"/>   |   |
| <b>Field:</b>      | <input type="text" value="Database"/>   | Primary scientific field of the event (additional ones can be added with "[[Category:some Scientific Field]]" to the article text |
| <b>Superevent:</b> | <input type="text"/>  | Abbreviation of event series, in case the event belongs to a continuing series  |
| <b>Start date:</b> | <input type="text" value="August"/> <input type="text" value="24"/> <input type="text" value="2008"/> |   |
| <b>End date:</b>   | <input type="text" value="August"/> <input type="text" value="27"/> <input type="text" value="2008"/> |   |
| <b>Homepage:</b>   | <input type="text" value="www.sigkdd.org/kdd2008"/>   | URL of the homepage (without <a href="#">http://</a> )  |
| <b>Logo:</b>       | <input type="text"/>  | <a href="#">Upload file</a>   |
| <b>City:</b>       | <input type="text" value="Las Vegas"/>  |   |
| <b>State:</b>      | <input type="text"/>  |   |










Source: openresearch.org

# Source code of form

[form](#) [discussion](#) [edit](#) [history](#)

## Editing Form:Event

**Warning:** You are not logged in. Your IP address will be recorded in this page's edit history.

**B**  **Ab**  **A**       

```
<noinclude>
This is the 'Event' form.
To add a page with this form, enter the page name below;
if a page with that name already exists, you will be sent to a form to edit that page.

{{#forminput:Event}}|

</noinclude><includeonly>
{{{info|page name=<Event[Acronym]><unique number>}}}
{{{for template|Event}}}
=General Information=
{| class="formtable"
! Acronym:
| {{{field|Acronym|mandatory}}}
| Acronym of the event such as "ESWC 2009"
|-
! Title:
| {{{field|Title}}}
| Full title of the given event, e.g. "5th European Semantic Web Conference"
|-
! Series:
```

Source: openresearch.org

Browsing data:

Semantic Drilldown



# Semantic Drilldown

Browse data: Virtual Worlds

**Virtual Worlds** > **Language: Japanese** ⊗

Click on one or more items below to narrow your results.

**Subcategory:** [MMORPGs \(2\)](#)

▼ **Use:**

[Education \(3\)](#) · [Professional \(3\)](#) · [Gaming \(2\)](#) · [Community \(6\)](#)

▼ **Platform:**

[Web Browser \(3\)](#) · [PC \(3\)](#) · [Mac \(3\)](#) · [Linux \(1\)](#) · [None \(2\)](#)

▶ **Language:** (Click arrow to add another property)

▼ **Communication Features:**

[Private Messages \(2\)](#) · [Single Voice Chat Channel \(1\)](#) · [Text Chat \(2\)](#) · [Text Chat User Blocking \(1\)](#) · [Voice Chat \(1\)](#) · [Voice Chat Speaker Identification \(1\)](#) · [Voice Chat User Blocking \(1\)](#) · [None \(4\)](#)

▼ **Content Features:**

[Duplication of content \(1\)](#) · [IP Rights \(1\)](#) · [Land Ownership \(1\)](#) · [Property Ownership \(2\)](#) · [User-Generated Content \(1\)](#) · [None \(4\)](#)

▼ **Economic Features:**

[Currency \(2\)](#) · [Real Money Trading \(1\)](#) · [In-World Marketplace \(1\)](#) · [None \(4\)](#)

▼ **Management Features:**

[Age Restrictions \(2\)](#) · [Age Verification \(1\)](#) · [Code of Conduct \(1\)](#) · [Moderators \(1\)](#) · [None \(4\)](#)

▼ **Privacy Features:**

[Privacy Policy \(1\)](#) · [Restricted Access \(1\)](#) · [Private Spaces \(2\)](#) · [None \(4\)](#)

▼ **Technical Features:**

[Complex 3-D \(1\)](#) · [Location Bookmarking \(1\)](#) · [Scripting \(1\)](#) · [Other \(1\)](#) · [None \(5\)](#)

▼ **Year Released:**

[2000 \(1\)](#) · [2003 \(1\)](#) · [2007 \(2\)](#) · [None \(2\)](#)

**Choose a category:**

[News \(5\)](#)

[Policy \(9\)](#)

[Properties of Virtual Worlds \(41\)](#)

[Virtual Worlds \(91\)](#)

Showing below up to 5 results starting with #1.

View (previous 250) (next 250) ([20](#) | [50](#) | [100](#) | [250](#) | [500](#))

**A**

■ [Ai Sp@ce](#)

..

**M**

■ [MeetMe](#)

-

**S**

■ [Second Life](#)

Source: [vworld.fas.org](http://vworld.fas.org)

# Displaying data:

Semantic Result Formats, Semantic Google  
Maps, Semantic Compound Queries

# Semantic Result Formats

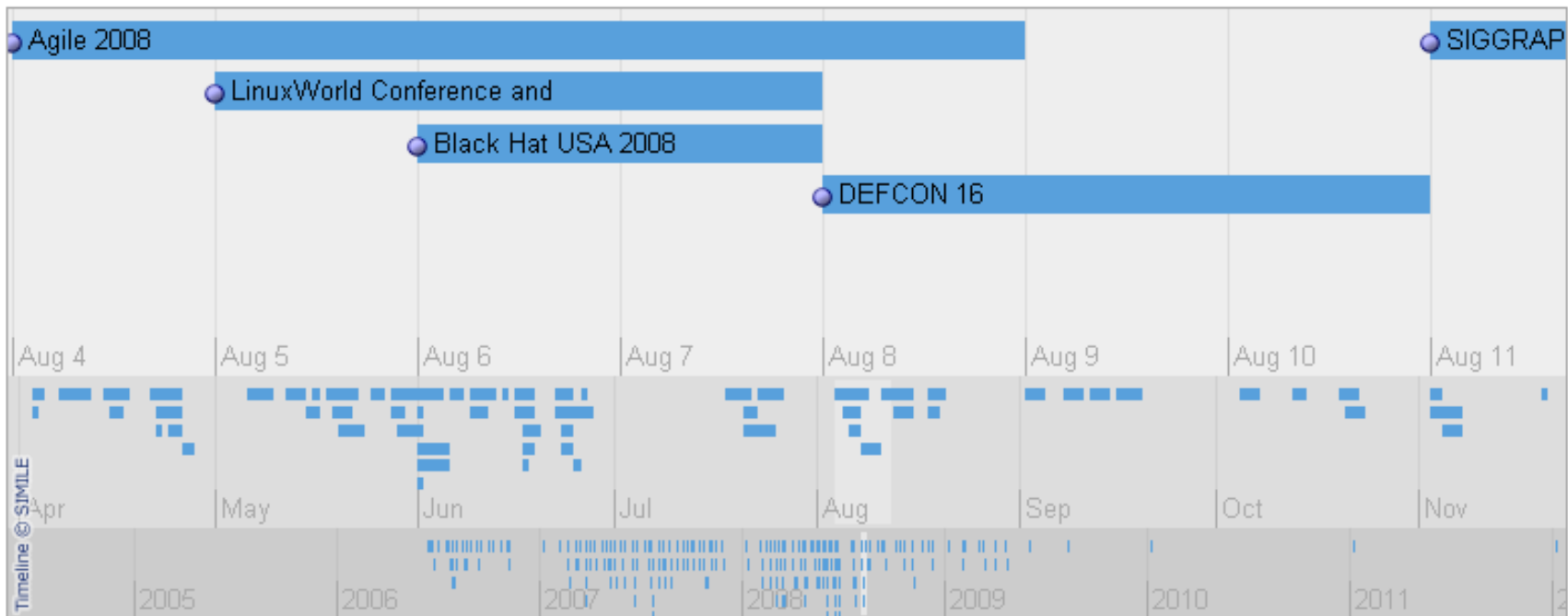
Additional formats for inline queries:

timeline, eventline, googlebar, googlepie, graph,  
calendar

...more formats planned

# Semantic Result Formats

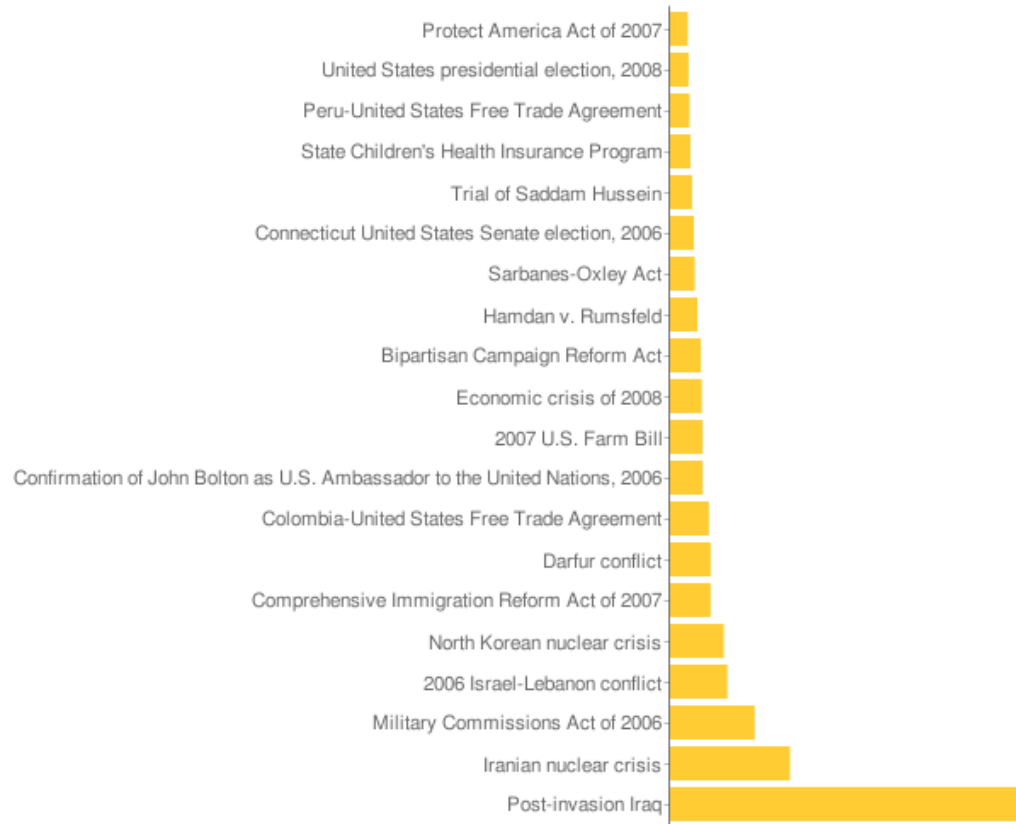
## 'timeline' format



Source: [techpresentations.org](http://techpresentations.org)

# Semantic Result Formats

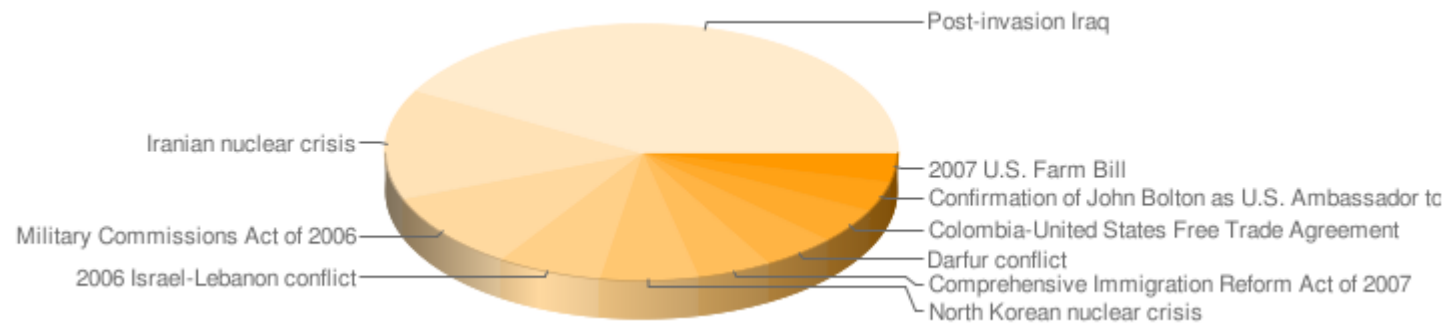
## 'googlebar' format



Source: [discoursedb.org](http://discoursedb.org)

# Semantic Result Formats

'googlepie' format



Source: [discoursedb.org](http://discoursedb.org)

# Semantic Result Formats

## 'calendar' format

November 2008

◀ Today ▶

November 2008 [Go to month](#)

| Sunday  | Monday   | Tuesday   | Wednesday   | Thursday   | Friday   | Saturday   |
|---|--|---|---|--|--|--|
| Obama is the better choice <span>26</span>  | Welfare for Detroit <span>27</span>                          | <span>28</span>   | <span>29</span>   | It's time <span>30</span>  | McCain for President, Part II <span>31</span>  | <span>1</span>   |
| Barack Obama has the vision and the judgment to lead the country now<br>Joseph W. McQuaid: America's choice this Tuesday <span>2</span> | What We're Fighting For <span>3</span>                       | <span>4</span>  | <span>5</span>  | <span>6</span>   | <span>7</span>   | <span>8</span>   |
| <span>9</span>  | Detroit Auto Makers Need More Than a Bailout <span>10</span> | <span>11</span>   | <span>12</span>   | Bailout won't cure what ails Big Three<br>Provide assistance now <span>13</span> | A Lemon of a Bailout<br>A questionable bailout of America's Big 3 automakers<br>Bailout to Nowhere<br>Panic in Detroit <span>14</span> | Detroit Automakers a Relic of the Past<br>'Drop Dead' Is Not an Option <span>15</span> |
| Bailout Nation<br>Why We Shouldn't Bail Out the Big Three Automakers <span>16</span>  | <span>17</span>  | Let Detroit Go Bankrupt <span>18</span>   | Bailing Out a Car Wreck<br>Why GM Deserves Support <span>19</span>  | <span>20</span>  | <span>21</span>  | <span>22</span>  |
| <span>23</span>   | <span>24</span>  | <span>25</span>   | A Car Wreck Made in Washington<br>Big Three Baloney <span>26</span> | <span>27</span>  | Putting a Face on Big Auto <span>28</span>   | <span>29</span>  |
| <span>30</span>   | America's Other Auto Industry <span>1</span>                 | Continuity We Can Believe In<br>It's 65 Million B.C. for the Detroit Three <span>2</span> | <span>3</span>  | <span>4</span>   | Everything is fine<br>Reality Check for Detroit <span>5</span>   | <span>6</span>   |

Source: [discoursedb.org](http://discoursedb.org)

# Semantic Google Maps

Google Maps used as both a query format and an interface within forms



Source: hackerspaces.org



# Semantic Compound Queries

Multiple queries called at the same time, allowing for displays like a map with different markers for different points



Source: [smw.referata.com](http://smw.referata.com)

Importing and exporting data:

Data Transfer

# Data Transfer

## Generates XML from template calls

```
- <Pages>
  - <Projects>
    - <Page>
      <ID>58</ID>
      <Title>Serviceeinrichtung BAM Rotholz</Title>
      - <Free_Text id="1">
        = Project description = = Short description of the project = Die BAM Rotholz, als nachgeordnete Dienststelle des BMLFUW,
        Steuerungselemente und Optimierung der internen Prozesse zu einer kundenorientierten Serviceeinrichtung umgestaltet. Die Qualität
        wirtschaftlichen Rahmens erhalten bzw. gesteigert werden. Die notwendige Gestaltungsfreiheit im Rahmen der starren Bundesverw
        der Flexibilisierungsklausel (BHG §§ 17a und 17 b) ermöglicht. = Current status and future steps for the project = Die Reorgar
        laufenden Anpassungen gesehen. Die erste Flexibilisierungsperiode endete mit 31.12.2006, während die 2. Flexibilisierungsperiode
        learned = Zu Beginn der Reorganisation ist die Einbeziehung der Mitarbeiter und der Personalvertretung in grundlegende Entsche
        ist es unbedingt notwendig, dass alle Mitarbeiter motiviert werden Vorschläge einzubringen, und diese in der Führungsebene ernst.
        Reorganisationsmaßnahmen müssen gezielt in Form von Projekten begleitet und durch Projektmanagement umgesetzt werden.
      </Free_Text>
    - <Project>
      <Award_category>collaborative governance</Award_category>
      <Award_type>submission</Award_type>
      <Award_year>2007</Award_year>
      <Language_code>de</Language_code>
      <Sector>internal organisation and affairs</Sector>
      <Type_of_activity>new forms of financing and financial management</Type_of_activity>
      <Keywords>dairy farming, Flexibilisierungsklausel</Keywords>
```

Source: [epsa-projects.eu](http://epsa-projects.eu)

# Data Transfer

Unfortunately, importing data (XML turned into new pages with template calls) is still not possible.

# Relevant links

- [semantic-mediawiki.org](http://semantic-mediawiki.org) – information on SMW and its extensions
- [referata.com](http://referata.com) – hosting of SMW and all the extensions mentioned here; basic usage is free
- [smw.referata.com](http://smw.referata.com) – “SMW Community Wiki” - information on people, organizations, SMW-based sites, etc.