J
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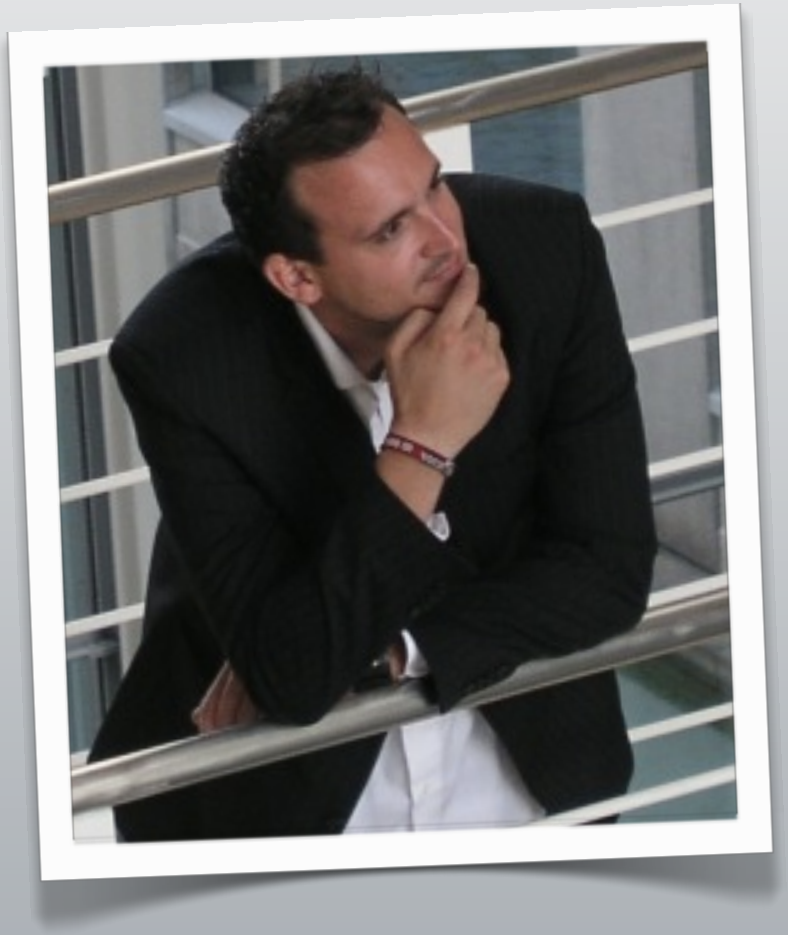
About me



- Java, UI and Apple nerd
- Java Development Lead at SIC GmbH in Dortmund, Germany
- I just started open source development

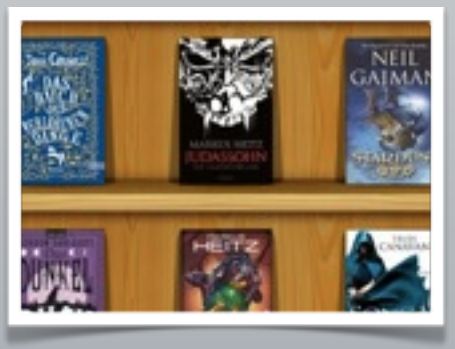
About GuiGarage

www.guigarage.com

- Just another Java blog
- My daily experience with Java & Swing
- Home of my opensource projects

GestureWrapper

jRating



jGrid

GestureWrapper

- Use Mac OS Multitouch gestures in every Java programm
- Forget about java.lang.NoClassDefFoundError

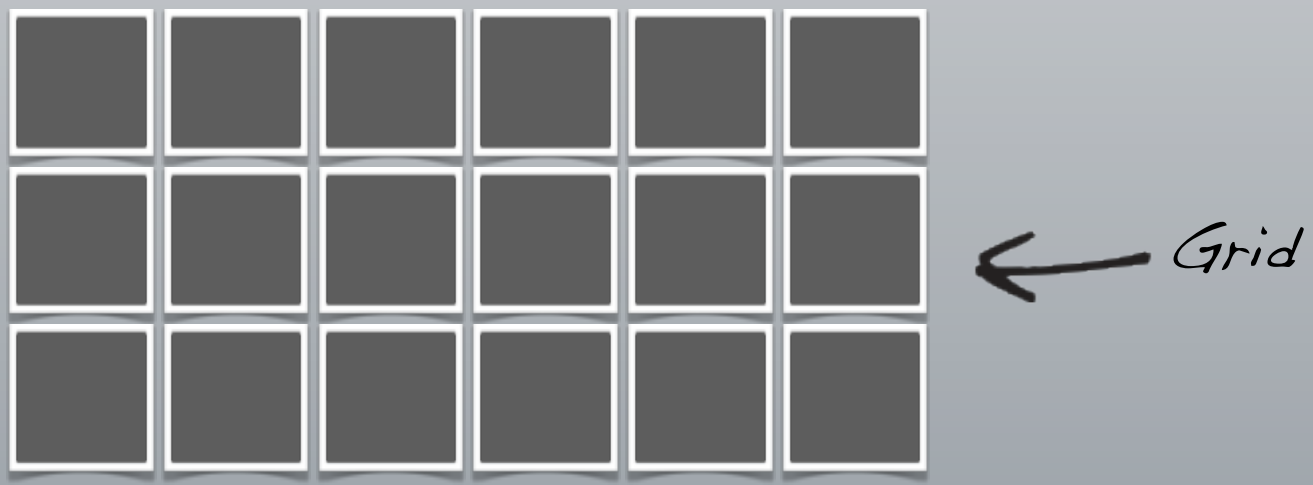
```
GestureUtilities.registerListener(panel, new GestureRotationListener() {...});
```

JRating

- Simple JComponent for rating
- Renderer support for different skins

JGrid

- Grid based visualization of Data
- Underlying data is administrated in a list
- Raw Data visualized by renderer



Examples of grid based views

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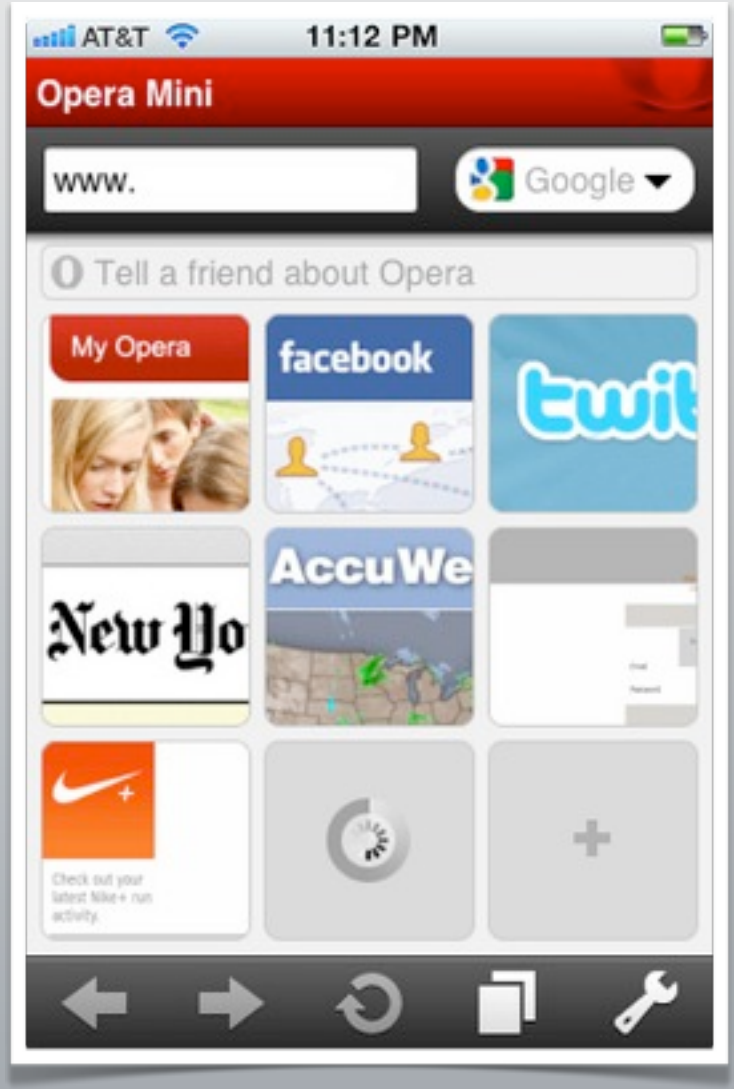
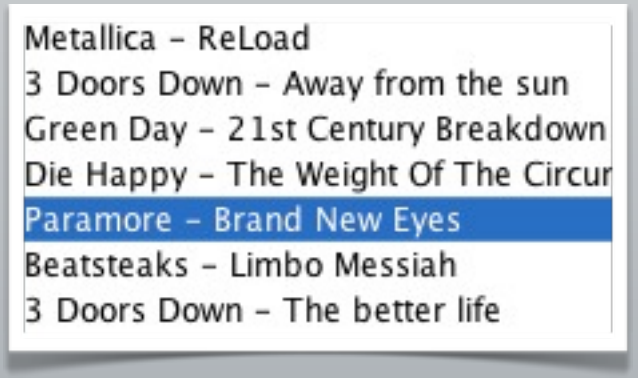


When to use grids?

three options for visualizing non-hirarchical collections of data

List



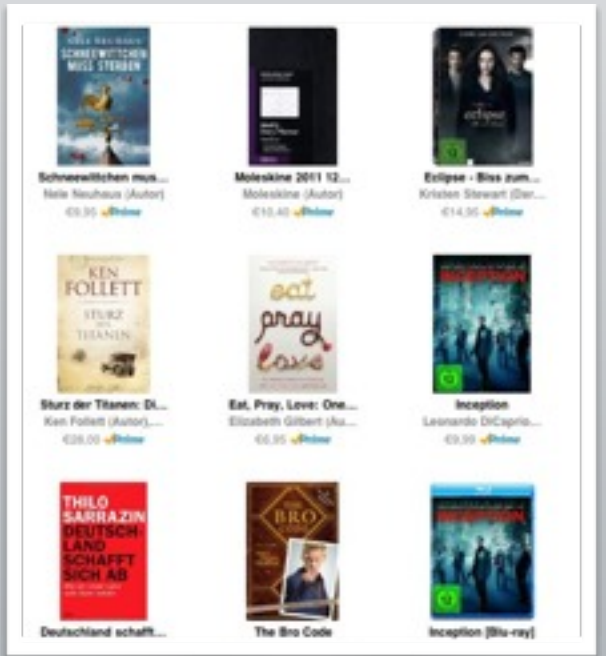
best overview for „simple" data

Table

First Name	Last Name
Kathy	Smith
John	Doe
Sue	Black
Jane	White

best overview for „complex" data

Grid



best overview for „illustrated" data

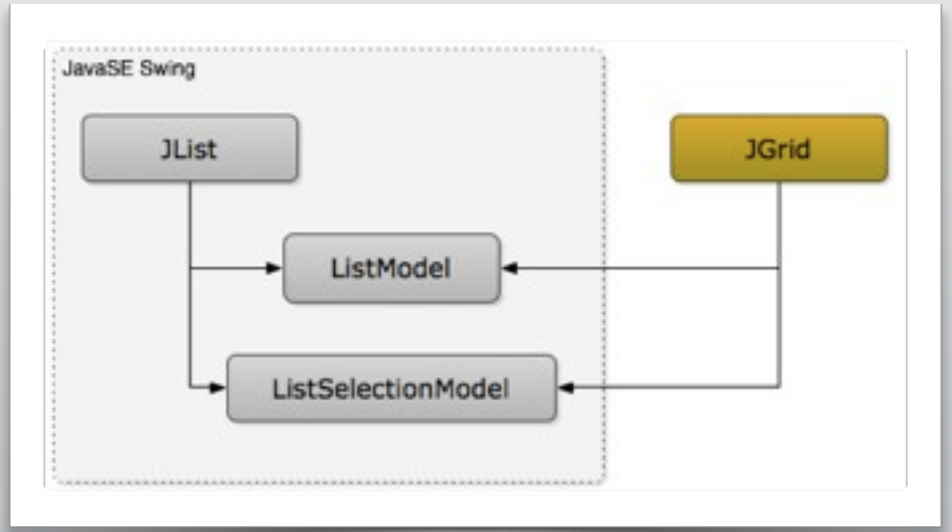
Integration

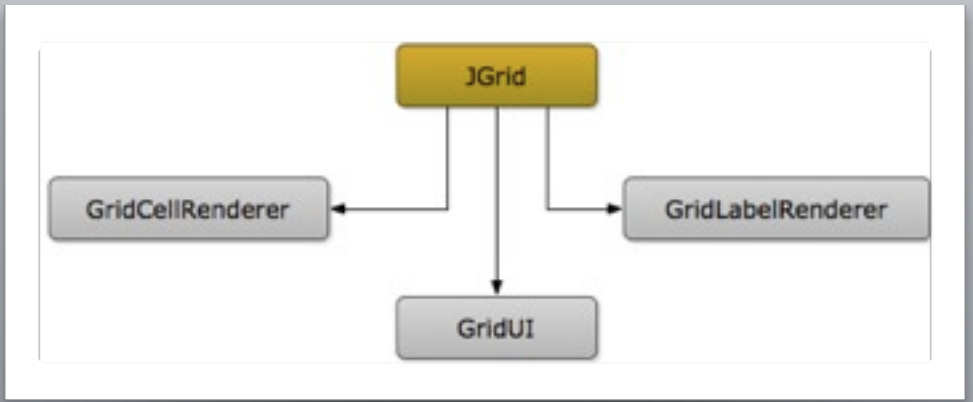
Name	Date modified	Type	Size
MSDNMagazine2009_08en-us.pdf	8/4/2011 5:27 PM	Adobe Acrobat D...	2,460
MSDNMagazine2009_09en-us.pdf	8/4/2011 5:28 PM	Adobe Acrobat D...	3,989
MSDNMagazine2009_11en-us.pdf	8/4/2011 5:27 PM	Adobe Acrobat D...	2,997
MSDNMagazine2009_12en-us.pdf	8/4/2011 5:28 PM	Adobe Acrobat D...	18,247
MSDNMagazine2010_01en-us.pdf	8/4/2011 5:28 PM	Adobe Acrobat D...	16,026
MSDNMagazine2010_02en-us.pdf	8/4/2011 5:29 PM	Adobe Acrobat D...	15,039

same data, different views

Integration

- Fall back on swing classes
- Shares interfaces with JList
- Makes use of the swing renderer concept





Develop a new example

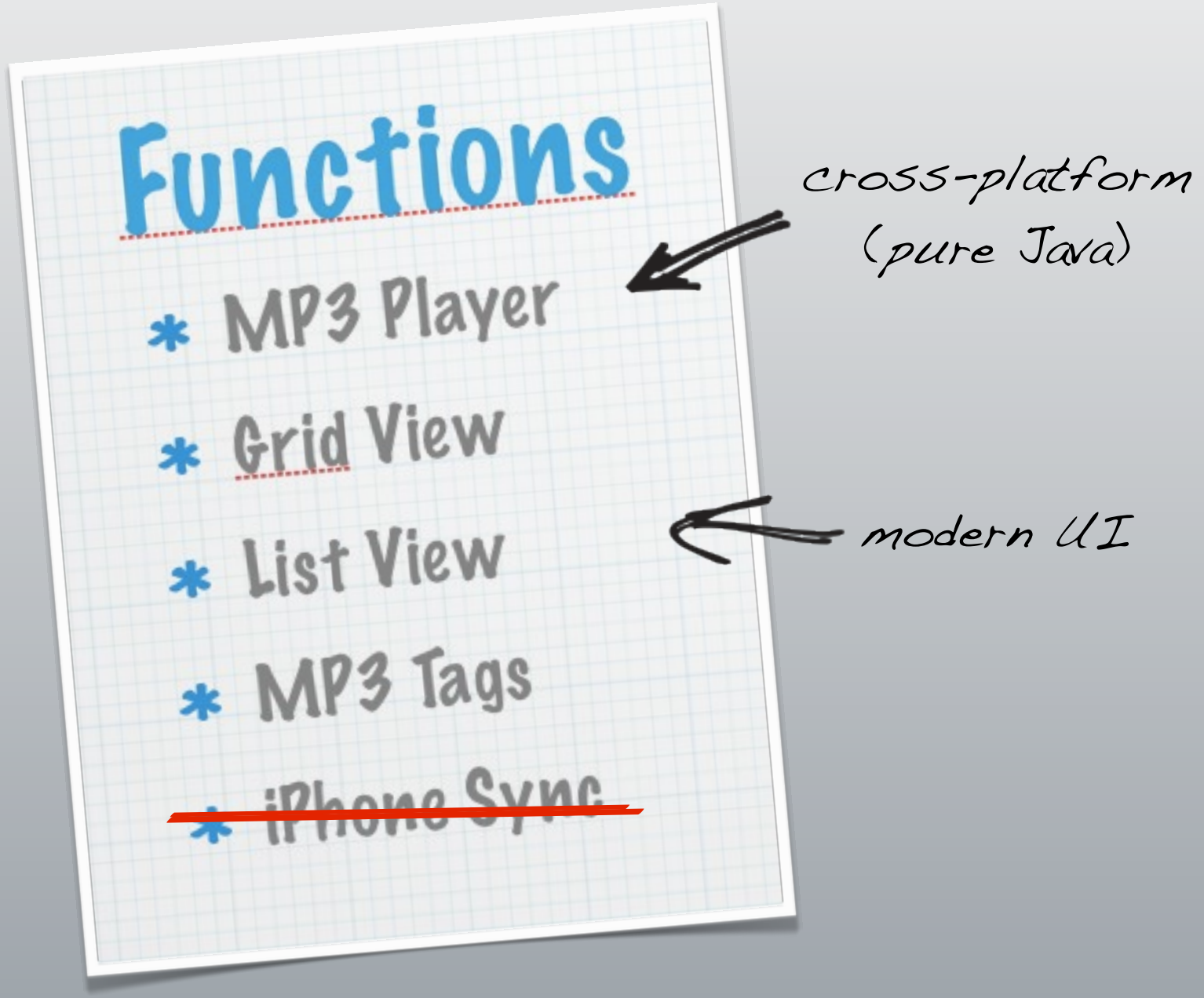
I copied „iBooks“

I copied „iPhoto“

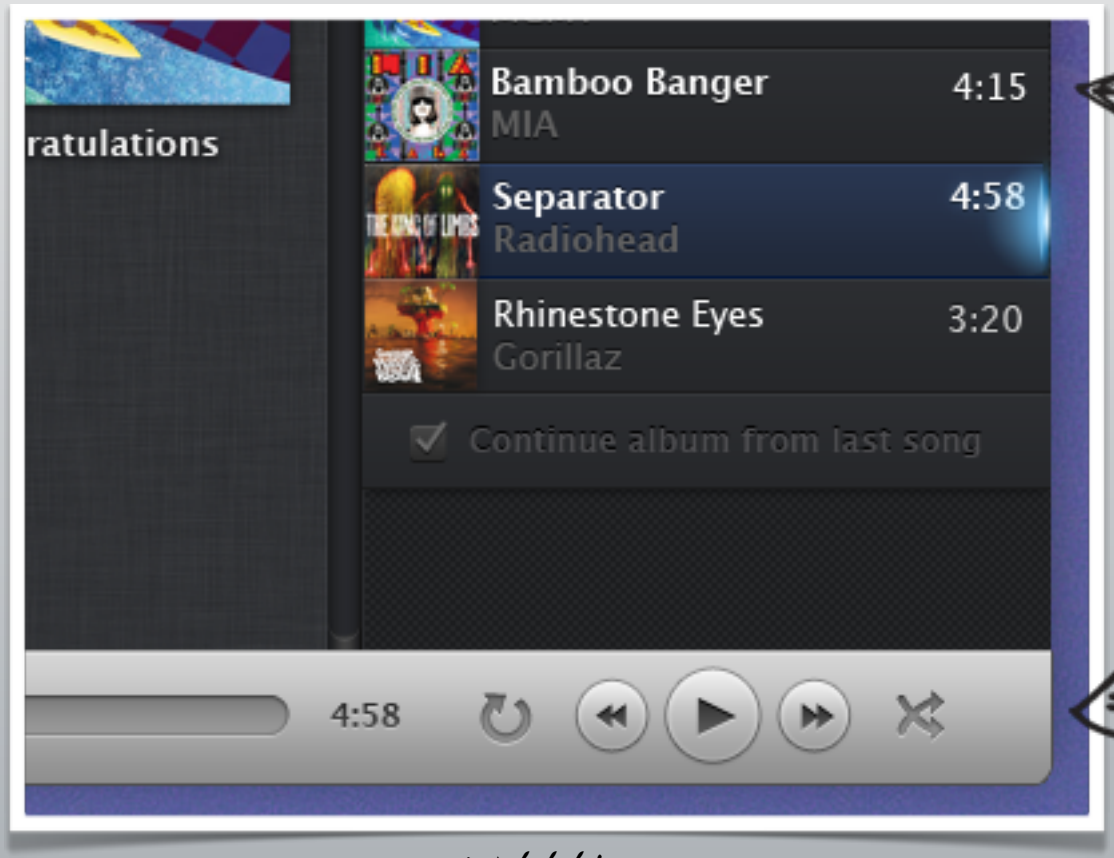
Let´s continue this series ...

Let´s copy iTunes...

... and implement GarageTunes



Collect some UI ideas



cool ListView

Controls

dribbble.com

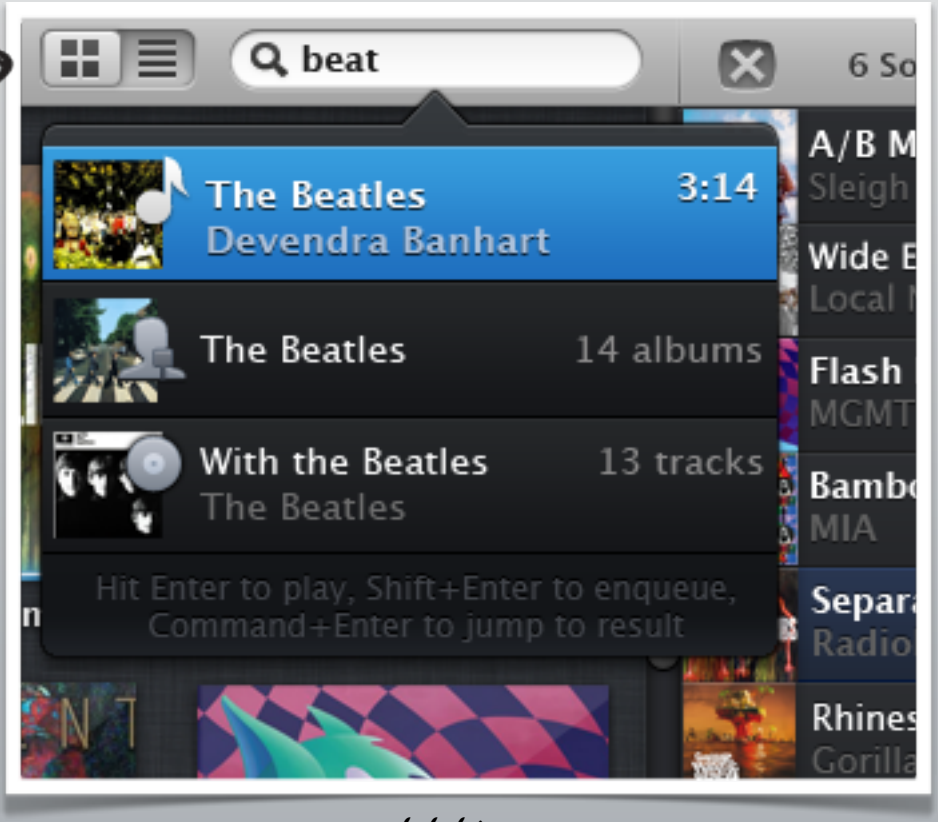
Collect some UI ideas

Grid of covers

dribbble.com

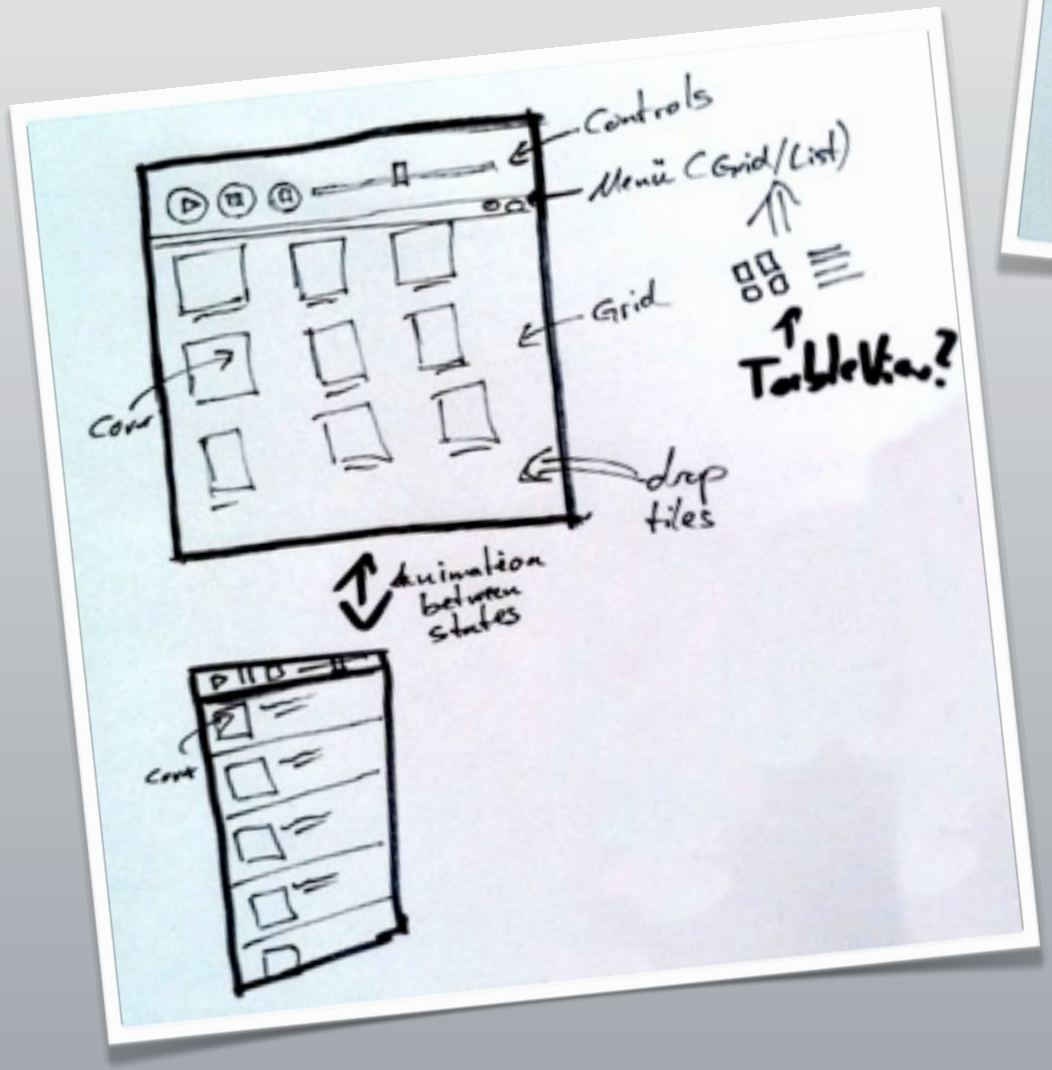
Collect some UI ideas

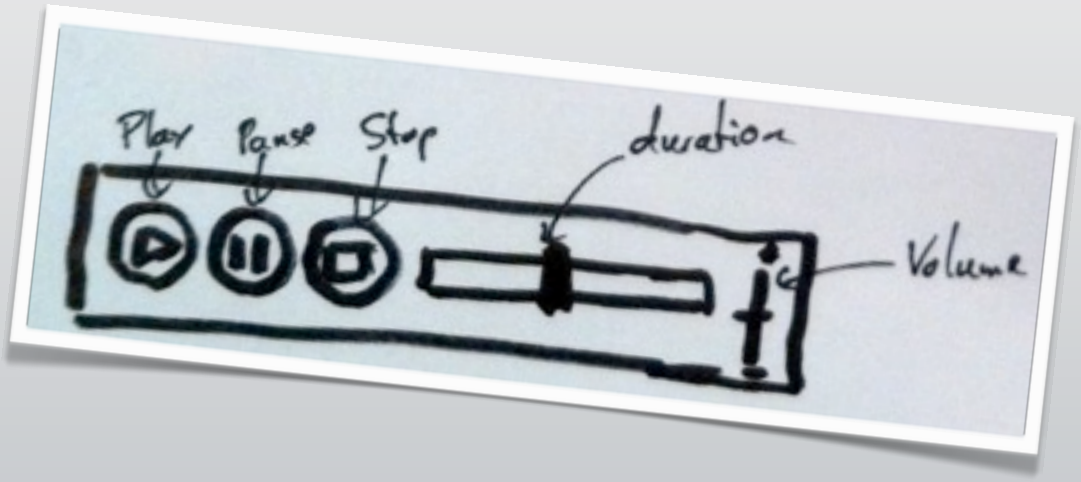
switch between
Grid & List

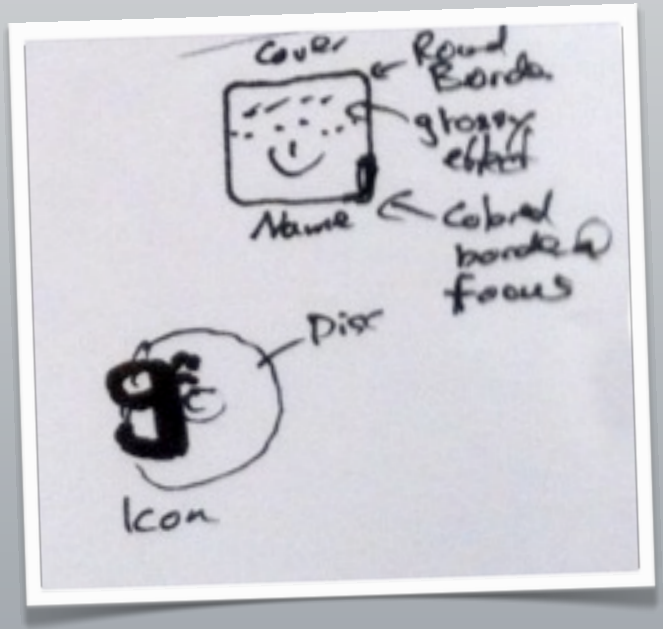


dribbble.com

User Interface Sketching

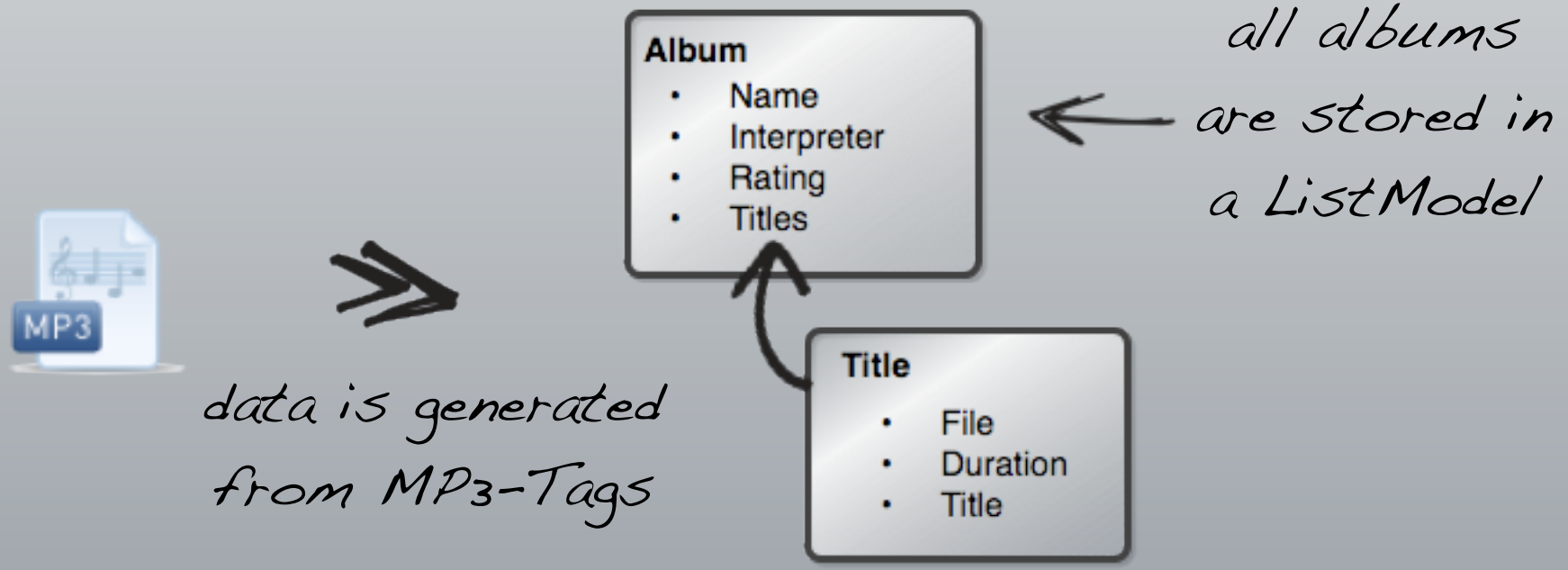




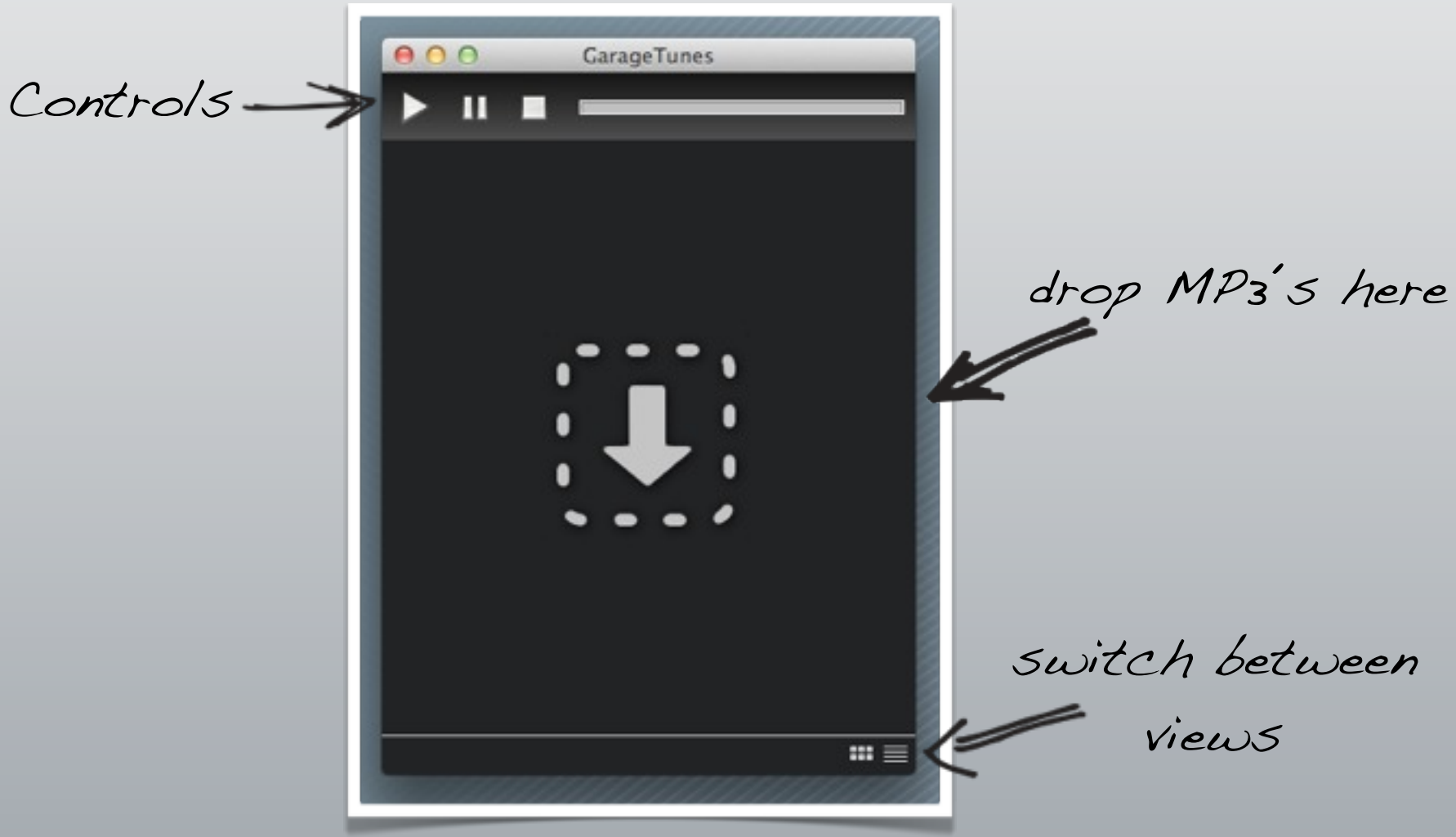


Implementing the model

- Create a datamodel
- MP3 to data (MP3-Tags)
- Drag & Drop MP3 files

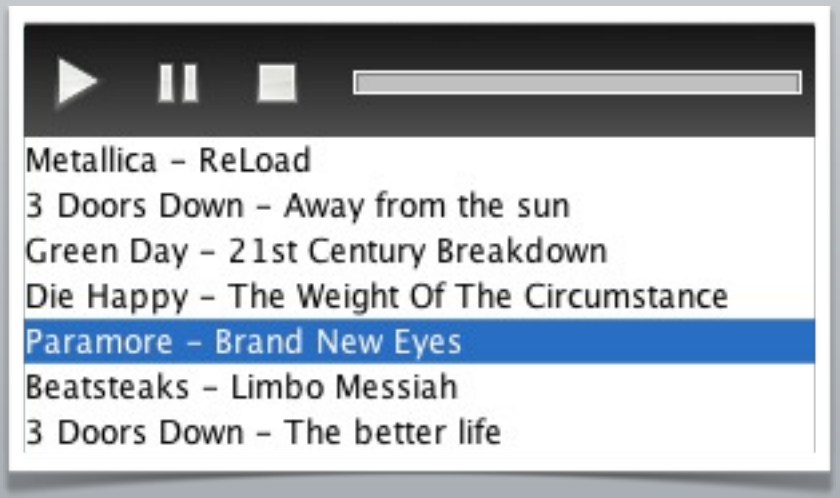


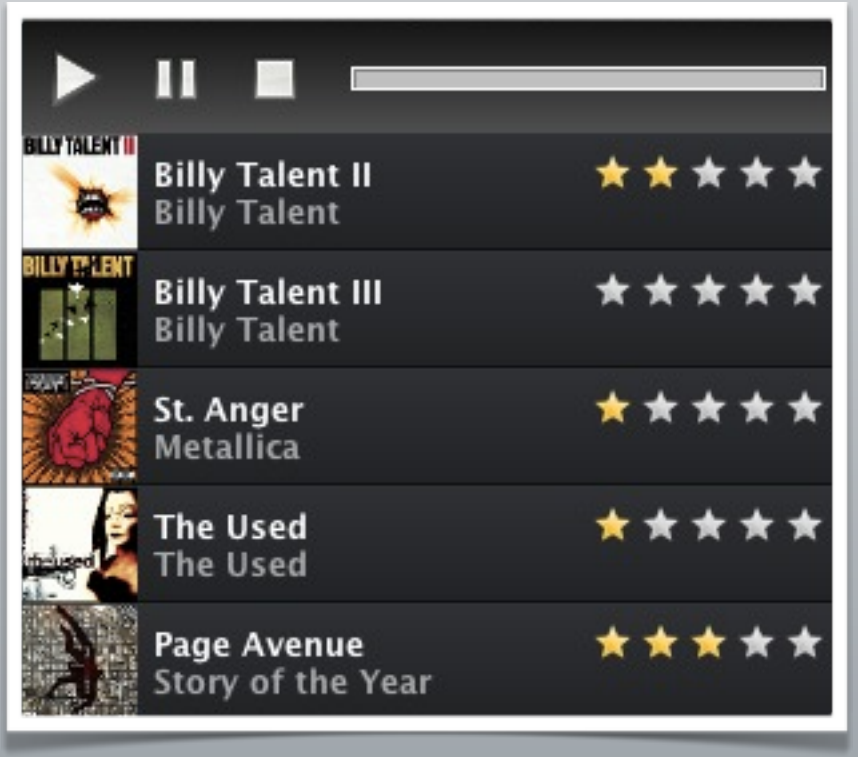
Intermediate result



Custom renderer

- Create a ListCellRenderer
- Activate antialiasing
- Use gradients





Retrieve album covers

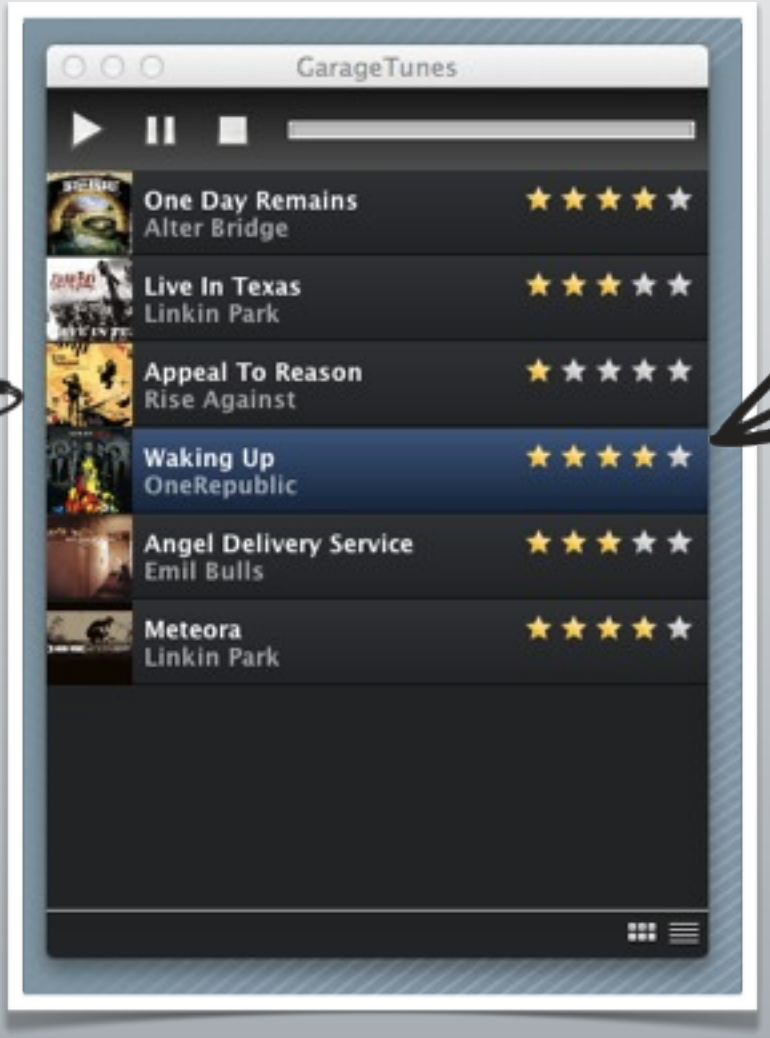
- Use amazon webservices
- Search by album name & interpreter

```
AWSECommerceService service = new AWSECommerceService();
service.setHandlerResolver(new AwsHandlerResolver(awsSecretKey));*
AWSECommerceServicePortType port = service.getAWSECommerceServicePort();

ItemSearchRequest itemSearchRequest = new ItemSearchRequest();
itemSearchRequest.setSearchIndex("Music");
itemSearchRequest.setArtist(interpreter);
itemSearchRequest.setTitle(albumName);
itemSearchRequest.getResponseGroup().add("Images");

ItemSearch itemSearch = new ItemSearch();
itemSearch.setAWSAccessKeyId(awsAccessKeyId);*
itemSearch.getRequest().add(itemSearchRequest);
ItemSearchResponse response = port.itemSearch(itemSearch);
```

*register @ aws.amazon.com

Intermediate result

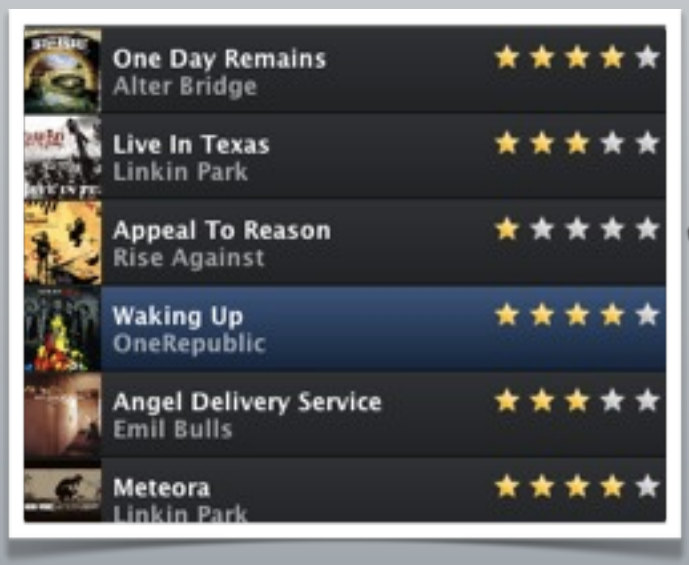
covers from amazon webservices

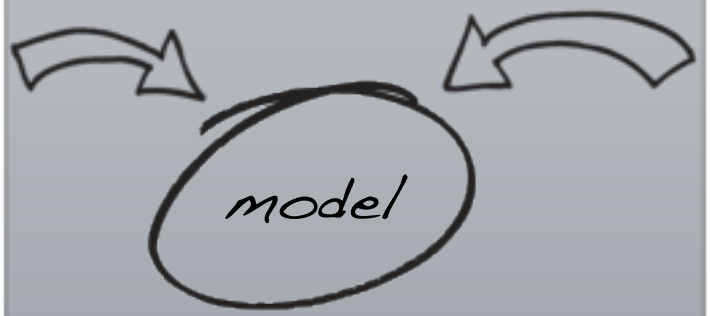


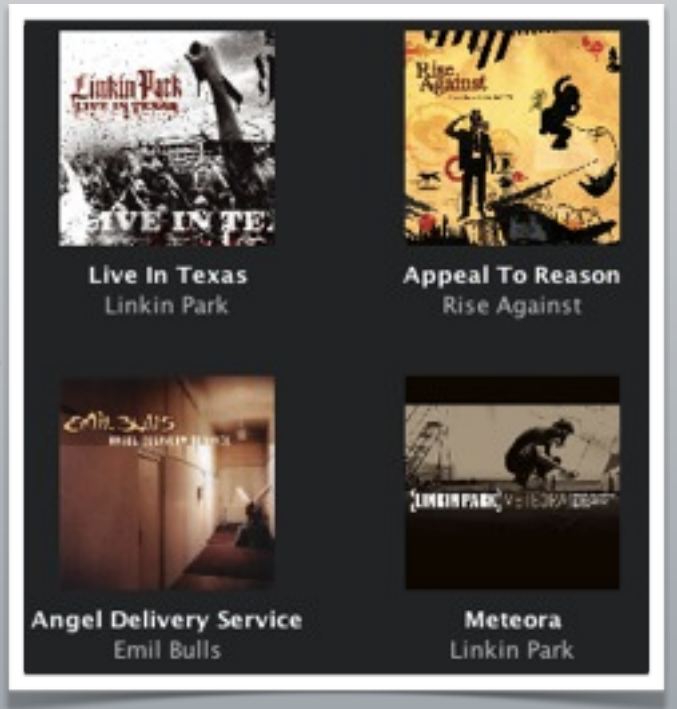
JRating as part of the renderer

Adding a gridview

- Add GridView
- Grid and list share selection & data model
- Add GridCellRenderer

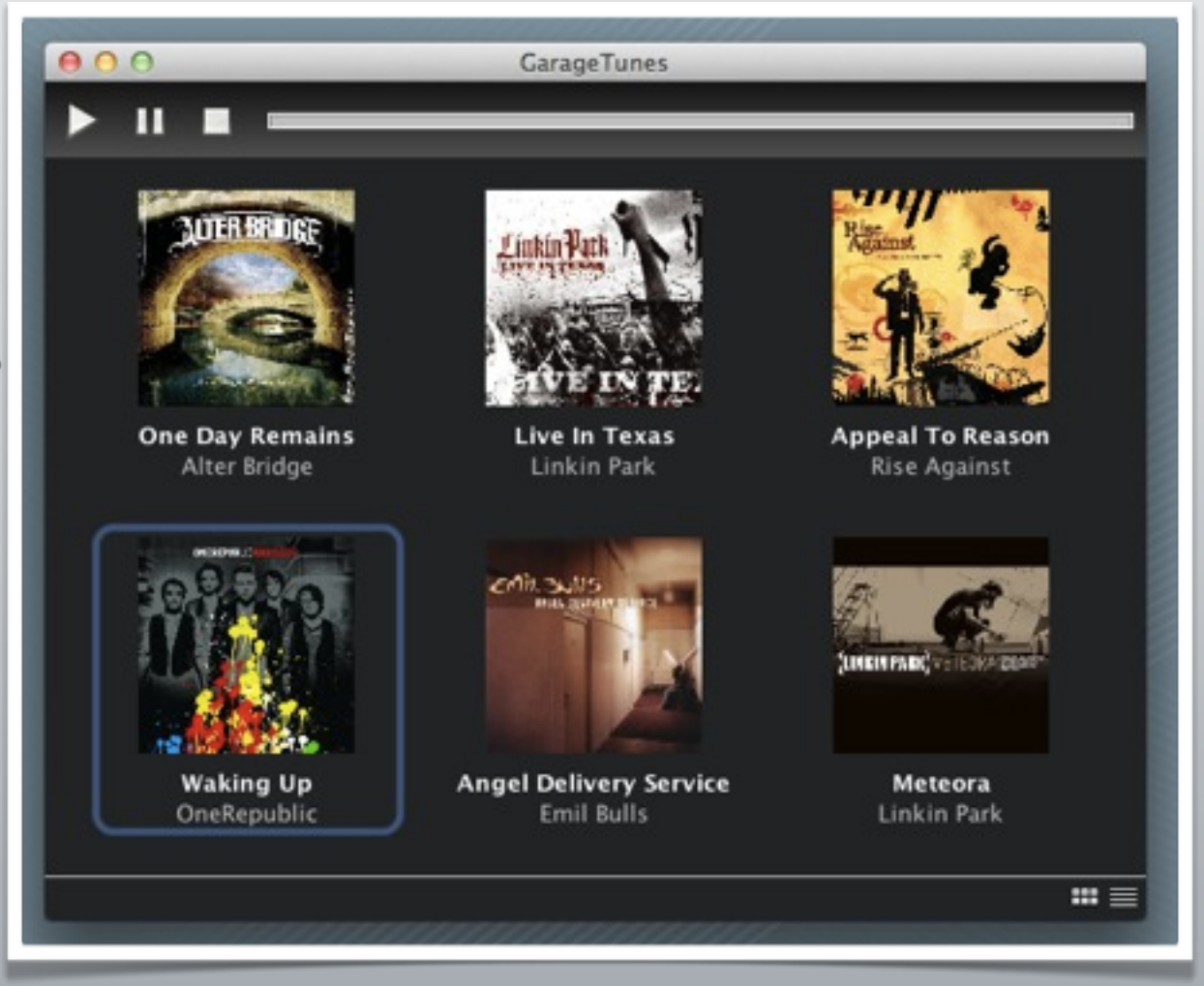






Intermediate result

pinch to zoom



Finishing coding

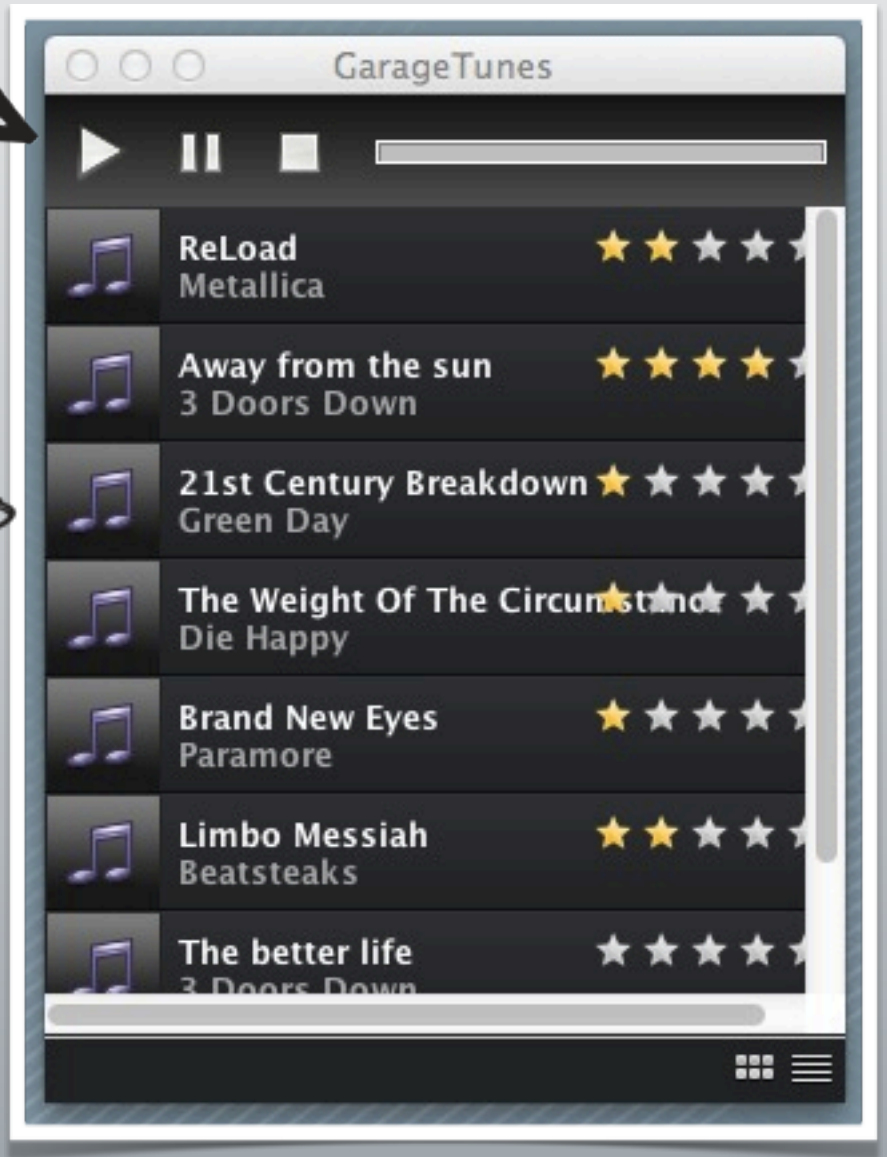
- Play the MP3s
- mp3spi.jar
  - Service provider interface
  - Use javax.sound.*
-

GarageTunes ToDos

better user feedback:
rollover effects on
controls

showing loading
state for covers
(animation?)

GarageTunes Icon



JGrid Roadmap

- Full support for ListSelectionModel (interval selection, etc.)
- Sorting & filtering
- Label renderer
- Cell & label editor
- OS specific UIs

Summery

- Use JGrid alternative to JList
- Best practice:
  - Let the user change the view
  - share the models between the views
- Integrate gestures as a alternative to your user guidance
- Subscribe to my Blog feed

stay tuned for more UI stuff!

Q&A