

NOTICE!

- These materials are prepared only for the students enrolled in the course Distributed Software Development (DSD) at the Department of Computer Science and Engineering, University of Mälardalen, Västerås, Sweden and at the Faculty of Electrical Engineering and Computing, University of Zagreb, Croatia (year 2010/2011).
- For all other purposes, authors' written permission is needed!
- The purpose of these materials is to help students in better understanding of lectures in DSD and not their replacement!

Distributed Software Development

SmartCart Team

SmartCart beta prototype



Outline

- Project progress
- Team communication
- Project comments
- Working hours
- Demo
- Next steps



Project progress



- Short recap
- On schedule



Project progress

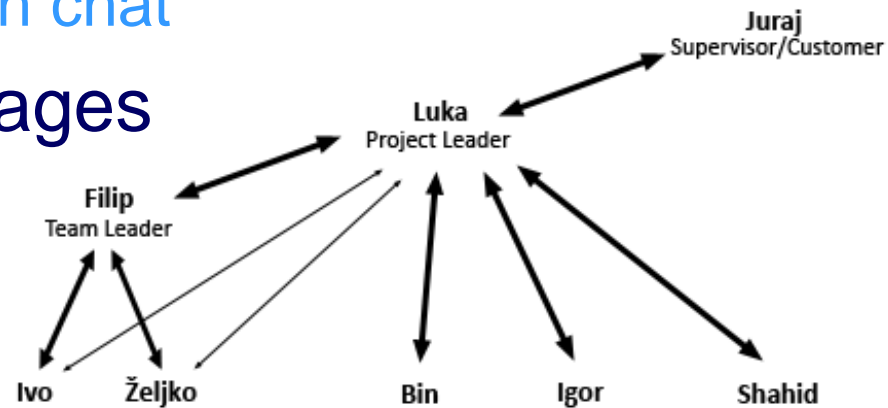
- Activity plan

Activity	w42	w43	w44	w45	w46	w47	w48	w49	w50	w51	w52	w1	w2
Requirement gathering	■	■			■		■						
Requirement Analysis	■	■			■		■		■				
Architecture Design	■	■	■	■									
Product Implementation			■	■	■	■	■	■	■	■	■	■	
Testing				■		■		■			■	■	
Deployment												■	■

- Second RUP iteration – beta prototype

Team Communication

- 16 formal team meetings
 - Skype voice combined with chat
- 316 Google Group messages
- Subteam meetings
 - in person, online
- Informal communication
 - Skype, Gtalk, E-mails
- Regular communication with the Supervisor/Customer
 - Skype, in person



Project comments (1/6)



- **Barcode**

- successfully implemented the barcode reading functionality
- support for 1D and 2D barcodes (ZXing)
- manual maintaince of the barcode database – not reliable



- Scan the barcode
- View product details page – add to chart
- Add this product as new



- Barcodes are not standardized across stores
- Barcode ID database is not available for Croatia
- In Sweden is partially available (outdated)

Project comments (2/6)



- **Web scraping**

- little usability – a lot of work
- can be implemented as a proof-of-concept but no value will be added to the project due to limited number of products offered online by the stores



- scraping of HTML sites is possible



- prices offered as images in .pdf formats
- small amount of products online
- very different formats in various store chains
- constantly changing formats (sales, discounts, etc..)

Project comments (3/6)



- **Store categories**

- **successfully implemented**

- different store chains categories (hidden from the user): same, different, unique

- **application is easier to use**

- **more intuitive**



- Major store chains have more than one stores on different locations
- Stores of the (most) chains have same products and prices
- Updating of the product price makes more sense
- Adding new product make more sense



- Store chains of category “same” that have local discounts –just one store reduces the prices

Project comments (4/6)



- Adding new stores by users
 - dropped
- Adding new stores by administrators – not initial requirement
 - can be part of marketing and sales – offer local stores to advertise through application
 - owners will provide information details about products they have



- Users can add local stores in their neighborhood to the application



- Can we trust user to set the address, name, and location of the store correctly?
- Who will add products and prices to the store?
- What shall we do with a store with 1-2 products – unlikely to be suggested

Project comments (5/6)



- “The minced meat” problem
 - if we have a 400g minced meat for one price and the 1200g minced meat for another price
 - currently postponed
 - how to gather information for that granularity of product details?
 - product, **units**, price
 - doable if we get the list of products from the stores, otherwise will not be implemented
- Contacting stores
 - we asked them to send us the list of products they offer
 - contacted major store chains in Croatia and Sweden
 - response is negative or no response is received

Project comments (6/6)



- **Good**
 - All the tasks for Beta prototype were successfully solved
 - Overall team feeling about the project progress very positive
 - Most of the final version functionality is implemented
- **Bad**
 - introducing store categories caused major redesign and additional work on web services, database, client functionality, etc.
 - Web server and SVN not available during last weekend

Working hours

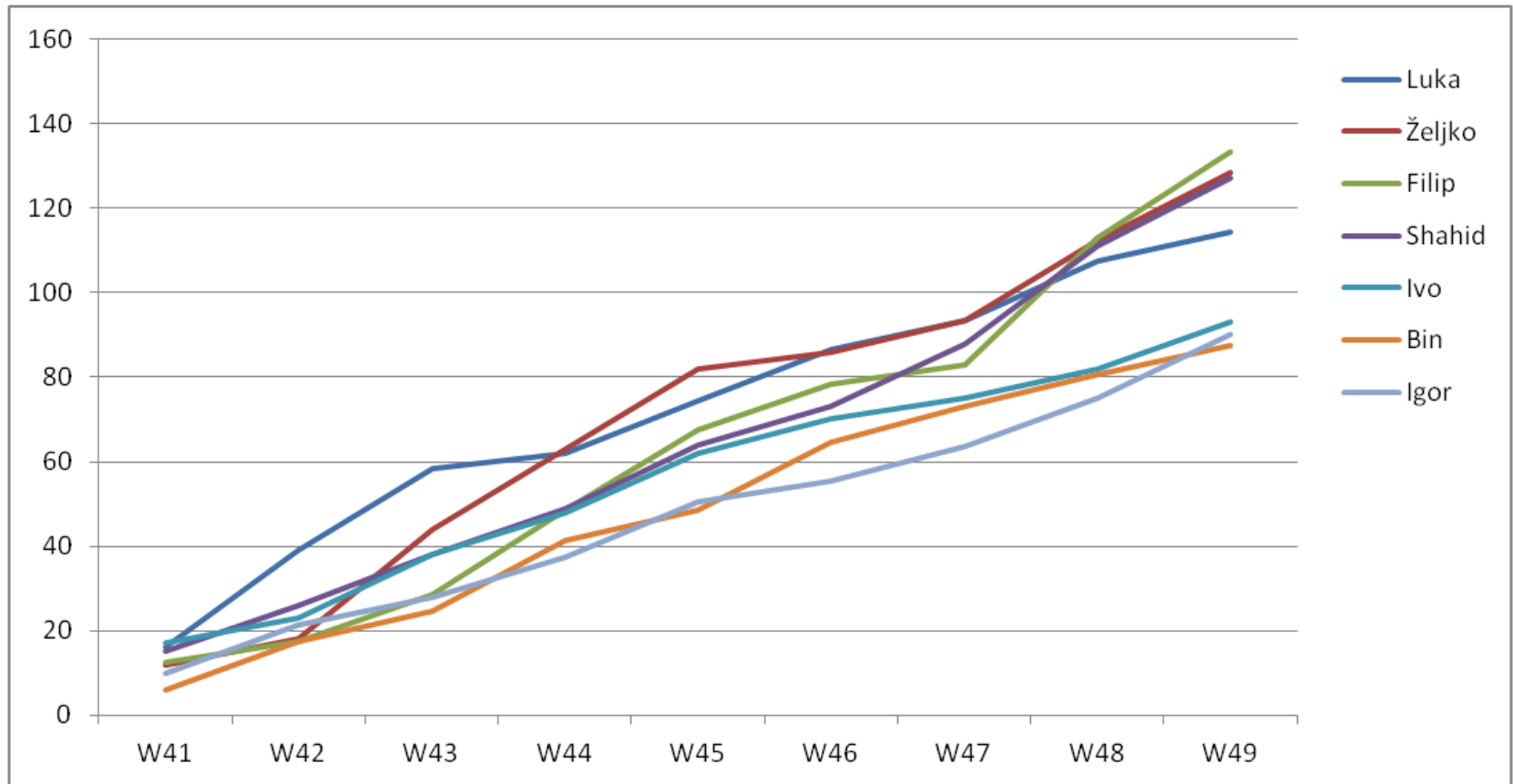


	W41	W42	W43	W44	W45	W46	W47	W48	W49	Total
Bin	6	11,5	7	17	7	16	8,5	7,5	7	87,5
Filip	12,5	5	11	20	19	11	4,5	30	20,5	133,5
Igor	10	11,5	6,5	9,5	13	5	8	11,5	15	90
Ivo	17	6	15	10	14	8	5	7	11	93
Luka	16	23	19,5	3,5	12,5	12	7	14	7	114,5
Shahid	15	11	12	11	15	9	15	23	16	127
Željko	12	6	26	19	19	4	7,5	19	16	128,5
Total	88,5	74	97	90	99,5	65	55,5	112	92,5	774

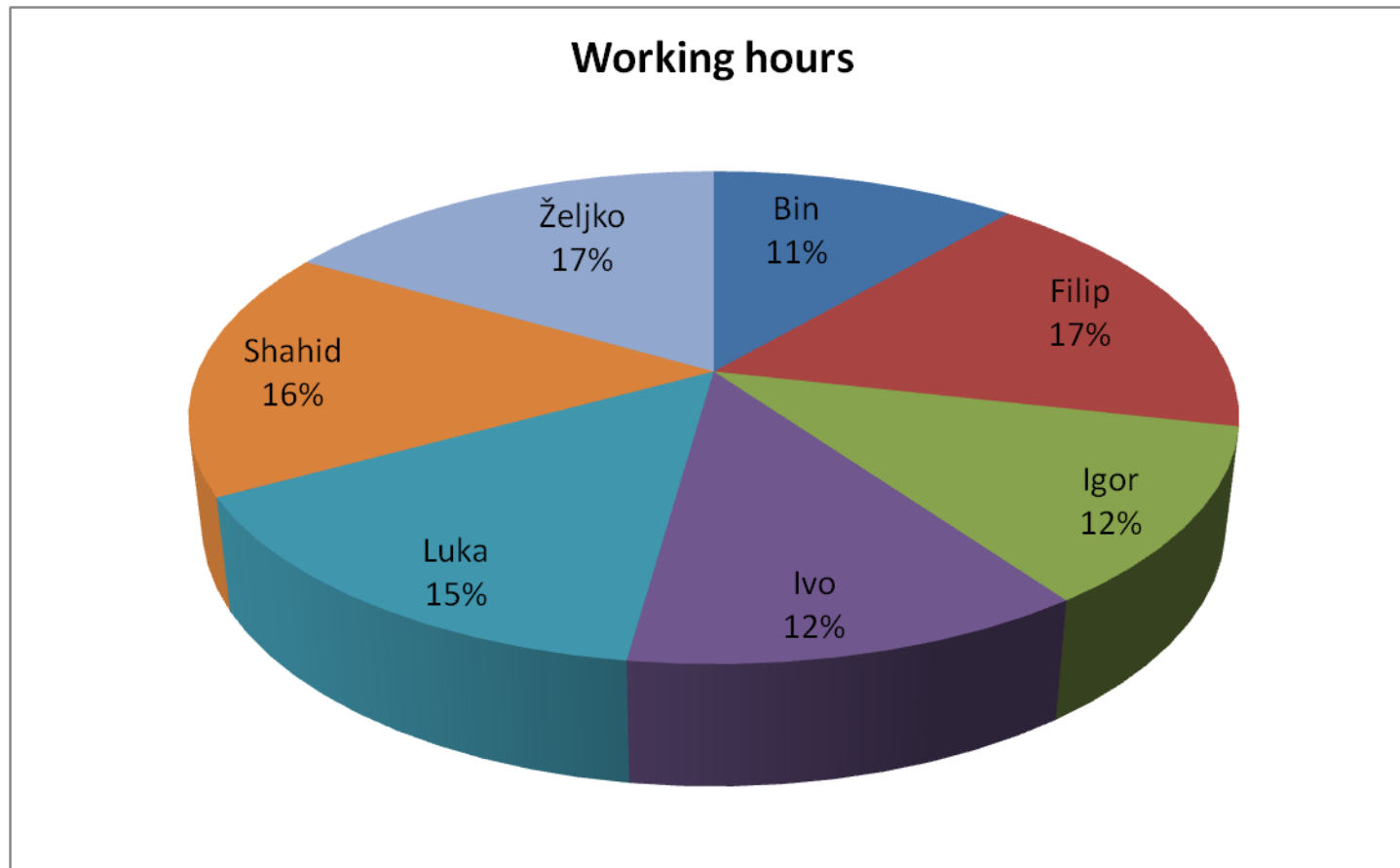
Working hours



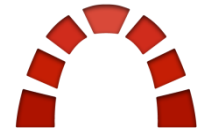
- Beta: 260h; Average: 110,6h; Total: 774h



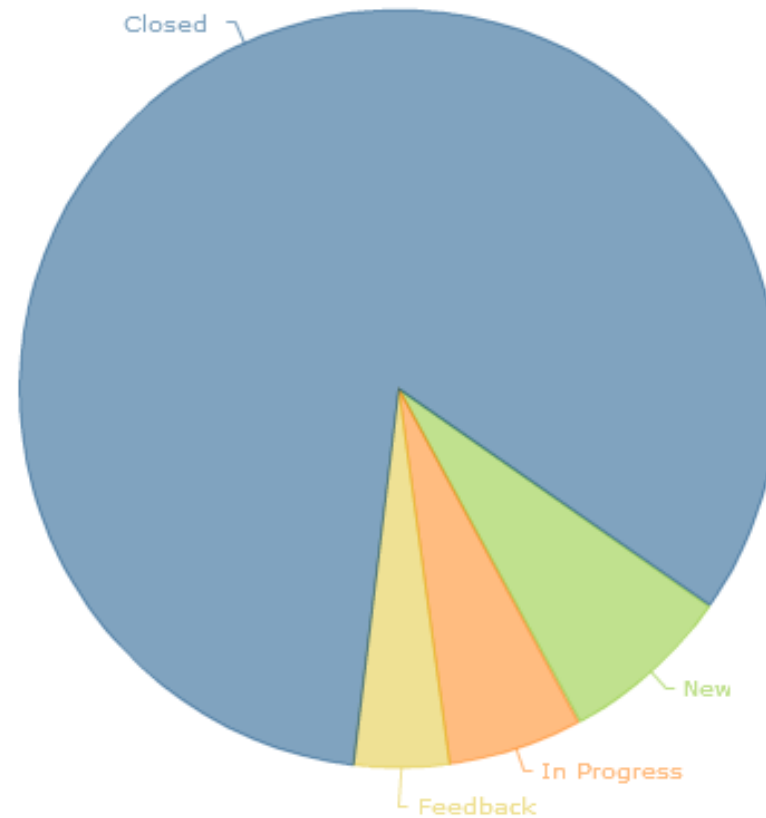
Working hours



Redmine PMS: Issues ratio



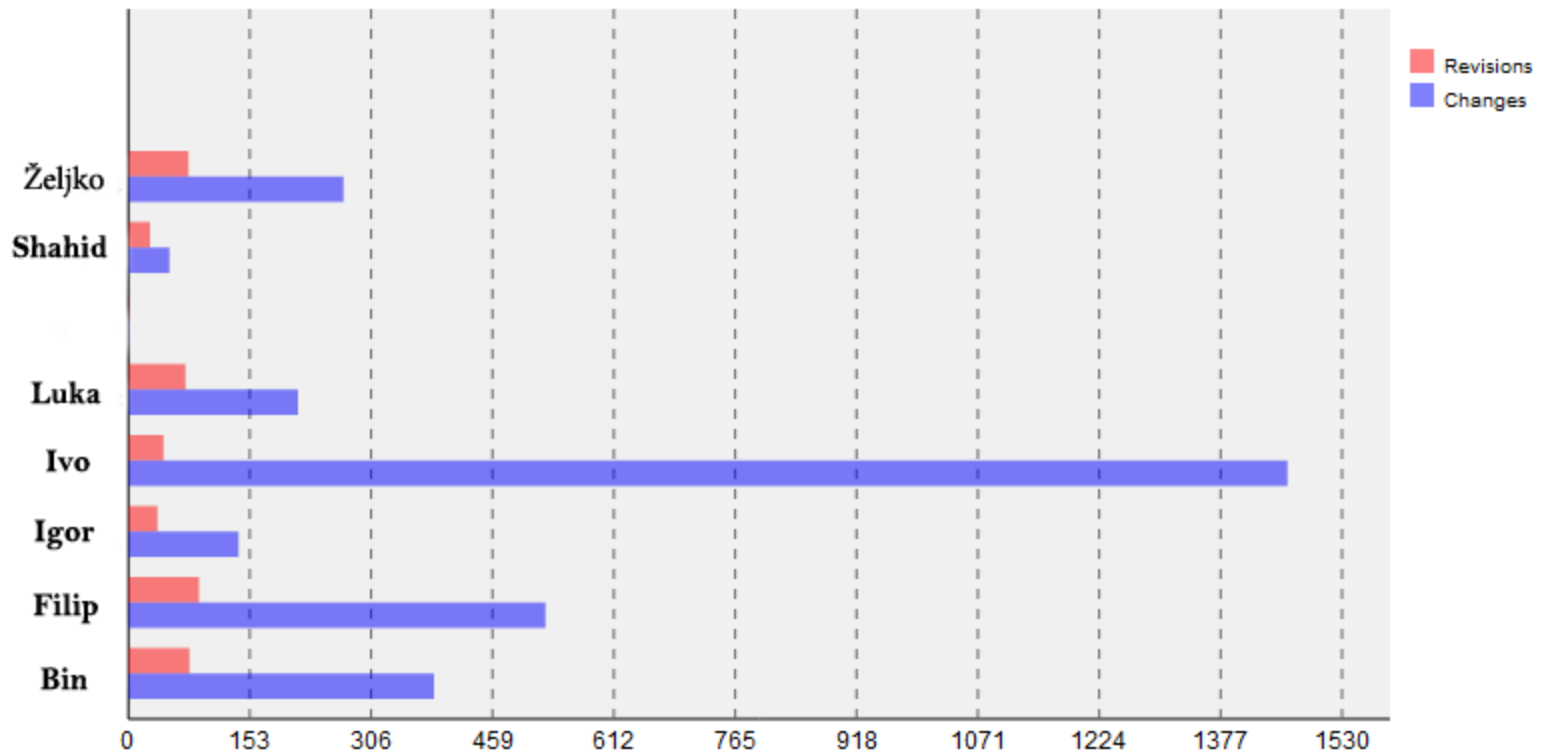
- Total: 122
 - Closed: 101
 - New: 9
 - In Progress: 7
 - Feedback: 5



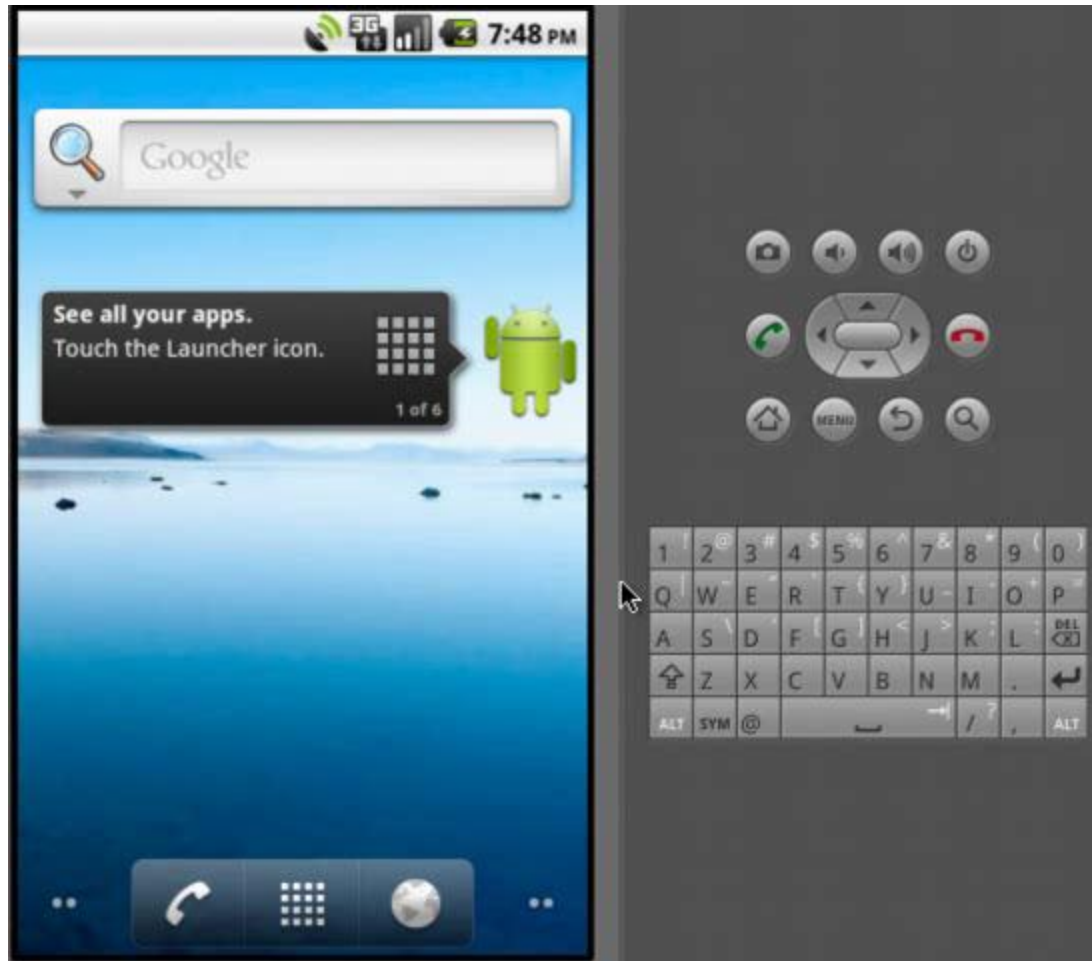
SVN commits



- Commits per author



Demo



Next steps

- Filling the database
- Swipe functionality
- Design
- Data checking and filtering



