

Project 1 Report
INSIGHTS HOMEPAGE

Summer Internship at



Summer Internship at **Intuit**

Visual Communication Project 1 by

Upasana Gadgil

136250004

Guide

Raaj Sivaram

Senior Manager, Experience Design, Intuit

Submitted in the partial fulfillment of
the requirements for the degree of

Master of Design

in Visual Communication

Industrial Design Centre

Indian Institute of Technology

Bombay

2013 - 2015

June 20, 2014

TO WHOMSOEVER IT MAY CONCERN

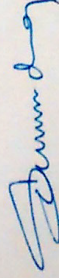
This is to certify that **Upasana Gadgil of IIT, Bombay** has undergone her Internship from **May 05, 2014 to June 20, 2014** at **Intuit India Product Development Center Pvt Ltd -Bangalore**. During this period she worked on the project entitled "**Insights Homepage**" under the able guidance of Project Manager **Raaj Sivaram**, Intuit Bangalore.

During the period of her work, her conduct and character were good and tasks assigned to her were completed satisfactorily.

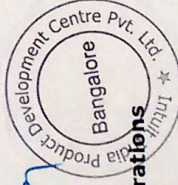
Thanking you

Sincerely,

For **Intuit India Product Development Center Pvt Ltd**



Sundareswaran V
Leader-Global HR Operations



Declaration

I declare that this written submission represents my ideas and work in my own words and where other ideas and words have been included, I have adequately cited and referenced the original sources.

I also declare that I have adhered to all principles of academic honesty and integrity and have not fabricated, misrepresented or falsified any idea/data/fact/source in my submission.

I understand that any violation of the above will be cause for disciplinary action by the Institute and can also evoke penal action from the sources which have thus not been properly cited or from whom permission has not been taken when needed.

Signature : 

Name : Upasana Gadgil

Roll No. : 136250004

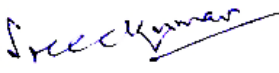
Date :

Approval Sheet

This Visual and Interaction Design project entitled "Insights Homepage" by Upasana Gadgil, 136250004, is approved in partial fulfilment of the requirements of master of Design Degree in Visual Communication.

Project Guide :

Chair Person :

Internal Examiner : 

External Examiner :

Date :

Place :

Acknowledgements

First of all, thanks to the Institute for letting me go for internship to the place of my choice and interest. I would like to thank our Head of the Department Prof. Chakravarthy to encourage us to go to the industry and gain exposure to real time design problems.

I would like to thank my Project Manager at Intuit Raaj Sivaram for giving me the liberty of choosing a design problem in their existing product and encouraging me to come up with a real time solution which would be practically implemented in the next release of the product. It was a great opportunity to work with Raaj who spent more than 9 years in Experience Design at Microsoft. His constant support and expert guidance at every stage of the project helped me shape what was just an idea into a tangible project.

I would like to express my gratitude to Deepa Bachu, Director of Product Management and Experience Design at Intuit who came up with an initiative of hiring design interns at Intuit for the first time in its history of 25 years and that too from an esteemed institute like Industrial Design Centre, IIT Bombay and I was the first one to be there as a design intern.

I would like to thank Sanjay Sen, Senior Experience Designer at Intuit for giving me time from his busy schedule and helping me understand the product better. He proved to be a very good mentor.

Thanks Faiz and Amit from Quality Analysis team for giving me quick insights about the product whenever required.

Lastly thanks to my family for their love, encouragement and support.

Contents

Abstract	vii
Introduction	01
About the Company	02
Design Process	03
What is Insights Homepage	04
Project I : Graph Design	06
Project II : Save as PDF	18
Project III : Poster Design	36
Learnings	42

Abstract

I chose to work for a product company because I thought it would be completely a new experience for me in terms of understanding the product, its users and their needs, design process being followed by the company, dealing with strict deadlines and working in a team.

I wanted to work on a project which would go live. And this was the main reason of me choosing 'Insights Homepage' as my project which gave me a huge scope to work upon. There was a wide scope to better the user experience for which I could use my course learnings, skills and knowledge.

This report outlines the design process that I have followed for all my three projects. From finding a problem to coming up with an appropriate solution, the details of all the stages are put down clearly so that the reader gets a complete understanding of end to end design process.

Introduction

Industrial Design Centre, IIT Bombay offers students an opportunity to spend their one to two months of time to gain industry exposure. After the learnings that we have gained through the assignments which we did through out the first year of the course, its a great experience to implement those learnings, skills and knowledge in catering solutions to the real time design problems. I did my internship at Intuit for 45 days that is from 5th May to 20th June.

The purpose of this report is to document the information like design process, findings, learnings and conclusions to help reader understand the complete flow of my design project.

To design something its important to understand the product, its function and its users. In case of QuickBooks which is an accounting software, first task for me was to understand the users and their work. Its users are small business owners, accountants, professional advisors and book keepers. After having a fair understanding about the users and their work it was easy for me to grasp the product and understand the problem better. I did sketches and explorations, discussed them with my team and then touched the graphic software for final representation.

After completing designs, providing visual specs to the developing team was also in my agenda. From finding a problem to coming up with design solution to sending the designs to developing team, all the stages are clearly described here. End to end experience of design is showcased in this report.

About the Company

Intuit Inc. is a leading provider of business and financial management solutions for small and mid-sized businesses; financial institutions, including banks and credit unions; consumers and accounting professionals.

Its flagship products and services, including QuickBooks, Quicken and TurboTax software, simplify small business management and payroll processing, personal finance, and tax preparation and filing. ProSeries and Lacerte are Intuit's leading tax preparation software suites for professional accountants.

Intuit Financial Services helps banks and credit unions grow by offering innovative online and mobile banking solutions that make it easier for consumers and businesses to manage their money.

Founded in 1983, Intuit had annual revenue of \$4.15 billion in its fiscal year 2012. The company has approximately 8,000 employees with major offices in the United States, Canada, the United Kingdom, India and other locations.

www.intuit.com

Design Process

Design process involved following stages :

- Who are the Users
- What are their needs
- Voice of Customers
- Goal Setting
- User Stories
- Design Principles
- UI Explorations
- UI Iterations
- Discussions
- Improvements
- Final Design

INSIGHTS HOMEPAGE

What is Insights Homepage ?

Insights Homepage is the page in QuickBooks Desktop Enterprise Solutions software that users see immediately after opening the software.

Customer benefit goal of Insights Homepage is to 'Deliver ongoing value to small business owners by up-leveling business data that they want to track while helping accountants give streamlined advise to clients. Help showcase their identity'.

Presently, the business data is up leveled in four carousels, they are,

Carousel 1 : Profit and Loss

Carousel 2 : Income and Expense Trend

Carousel 3 : Previous Year Income Comparison

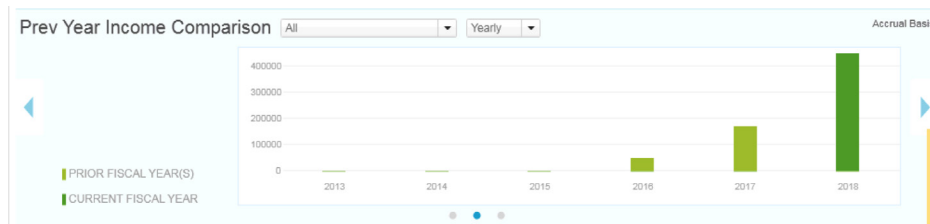
Carousel 4 : Top Customers by Sales



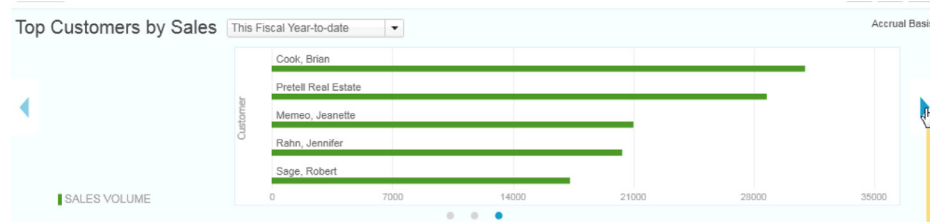
Carousel 1



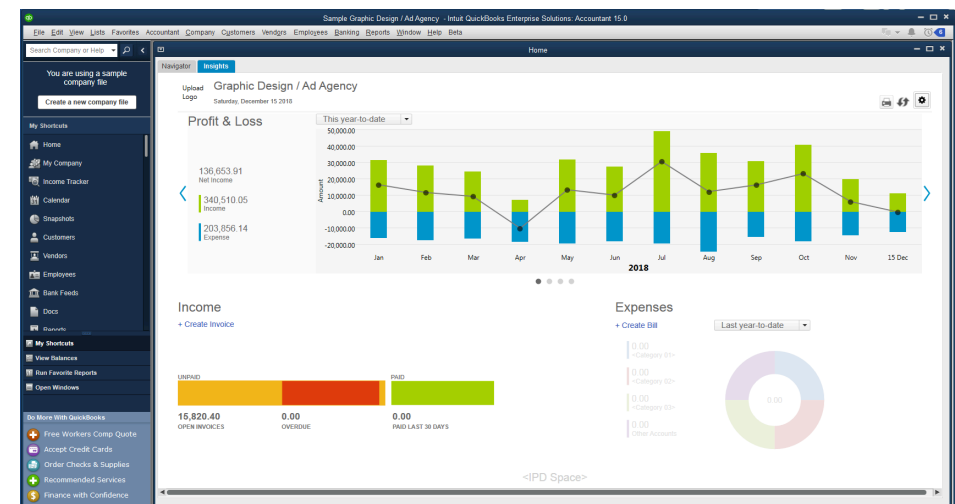
Carousel 2



Carousel 3



Carousel 4



Insights Homepage

Project I

Graph Design for Insights Homepage

Graph Design for Insights Homepage

Design Goal : To give users quick and more insights about their business

Customer Benefit Goal : To enable the user to make better decisions on transactions, managing relationships with their vendors and customers and run the business effortlessly.

Task : To design three new graphs for 'Customers who owe money', 'Best selling items' and 'Previous year expense trend'.

Description : These three new graphs are designed to be put up as added carousels on Insights Homepage. Carousels are customizable and users can chose to view whichever they would want to. Insights Homepage would now have total 7 carousels (4 existing + 3 new).

Graph Design 1 : Top Customers who owe money

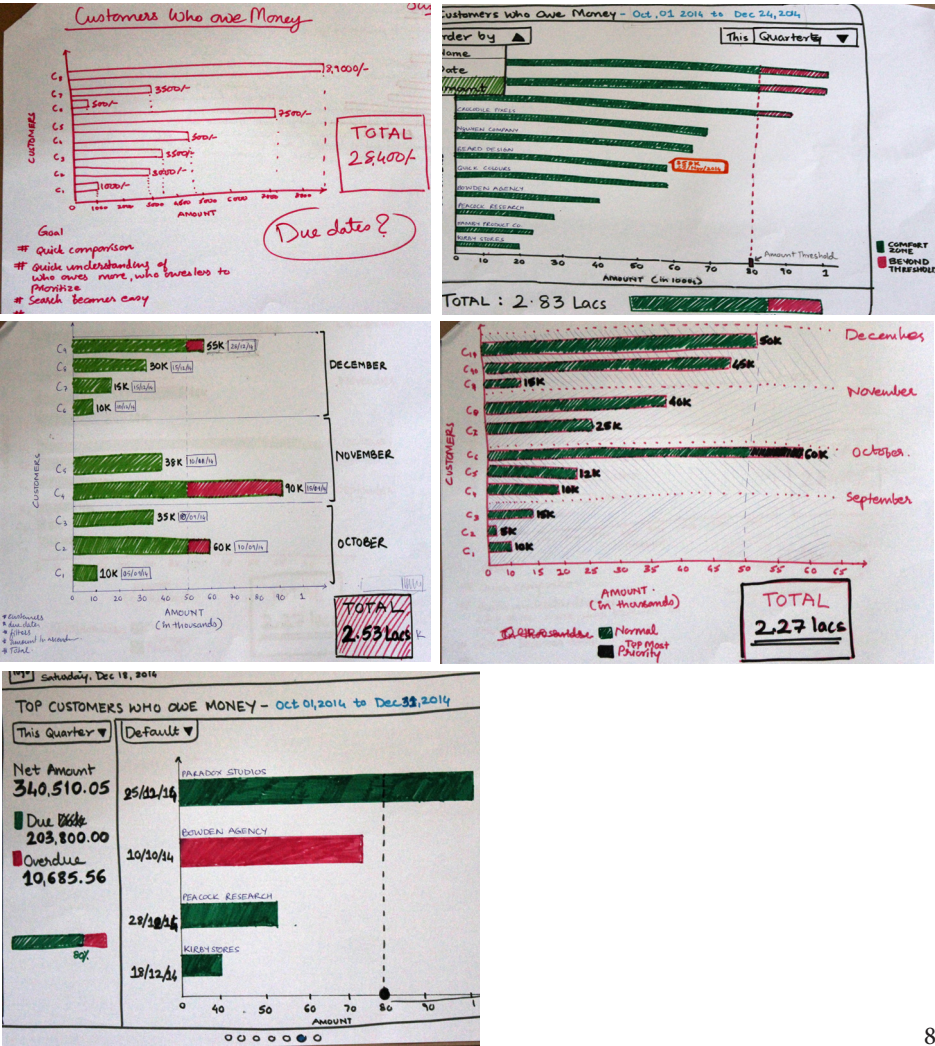
Design Goal : To let user easily know who all owe him money, what is the due amount and due dates.

Existing representation of 'Customers who owe money' :

Customers Who Owe Money		
CUSTOMER	DUE DATE ▲	AMT DUE ▲
Allard, Robert	09/27/2019	14,510.00
Mackey's Nursery and ...	11/04/2019	13,900.00
Pretell Real Estate	11/09/2019	5,026.50
Cook, Brian	11/14/2019	9,397.33
Hendro Riyadi	11/18/2019	4,223.00
Vitton, David	11/30/2019	700.00
Teschner, Anton	12/13/2019	565.95
Robson, Darci	12/15/2019	12,420.98
Melton, Johnny	12/20/2019	8,618.64
Burch, Jason	12/25/2019	1,005.00
Campbell, Heather	12/25/2019	12,000.00

Receive Payments

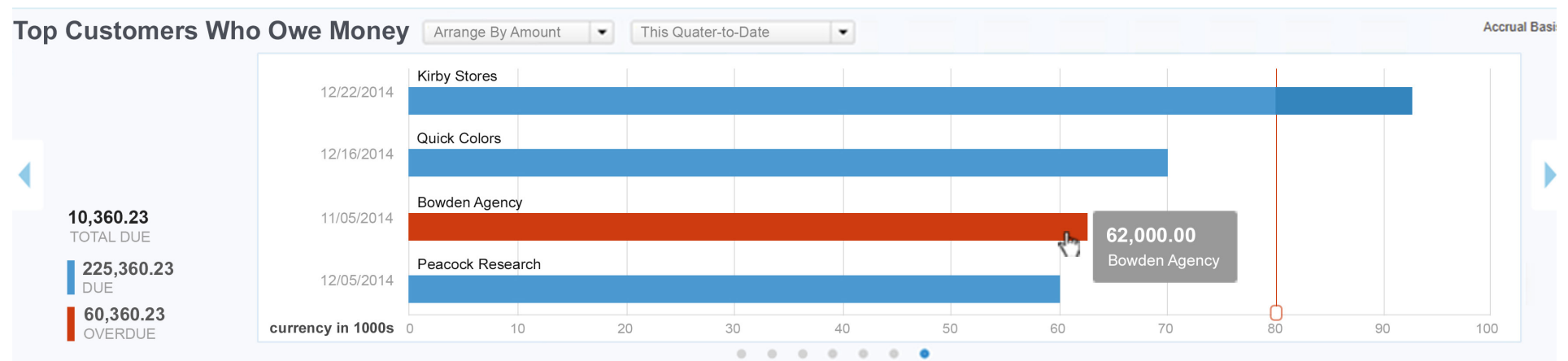
Explorations :



Challenges :

User might have a huge list of customers who owe him money. In graphical representation it is not possible to show all the customers. Hence, in this case user would be more interested in seeing customers with latest due dates or customers who owe more money. As I did explorations, I realised its possible to have a logical solution to this problem. Filter can help user see customers who owe money amount wise or date wise. Over due information is vital here. User is also given an option of setting a threshold of amount when which exceeded by any customer, it will stand as a to priority in this graph. Threshold is customizable , according to the company's income threshold can be set.

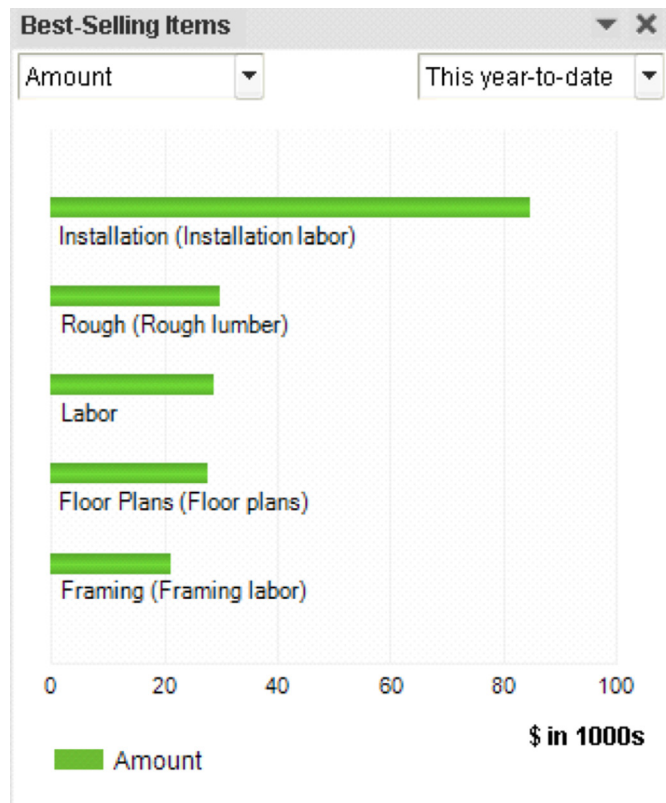
Visual Design Solution :



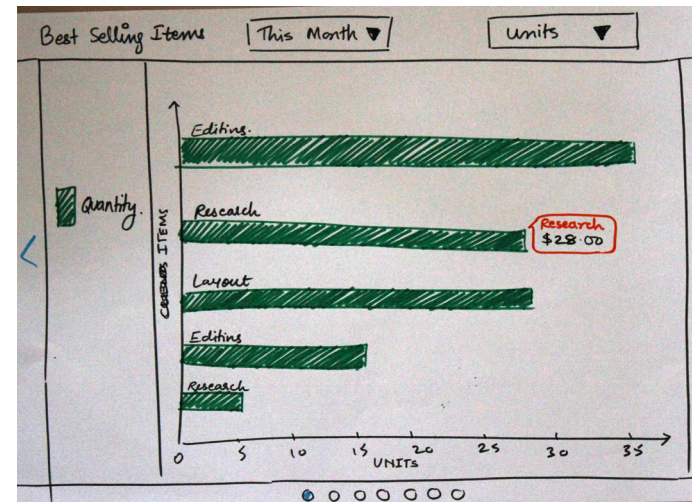
Graph Design 2 : Best Selling Items

Design Goal : To let user easily know which of his items or products or services are in demand.

Existing representation of 'Best Selling Items' :



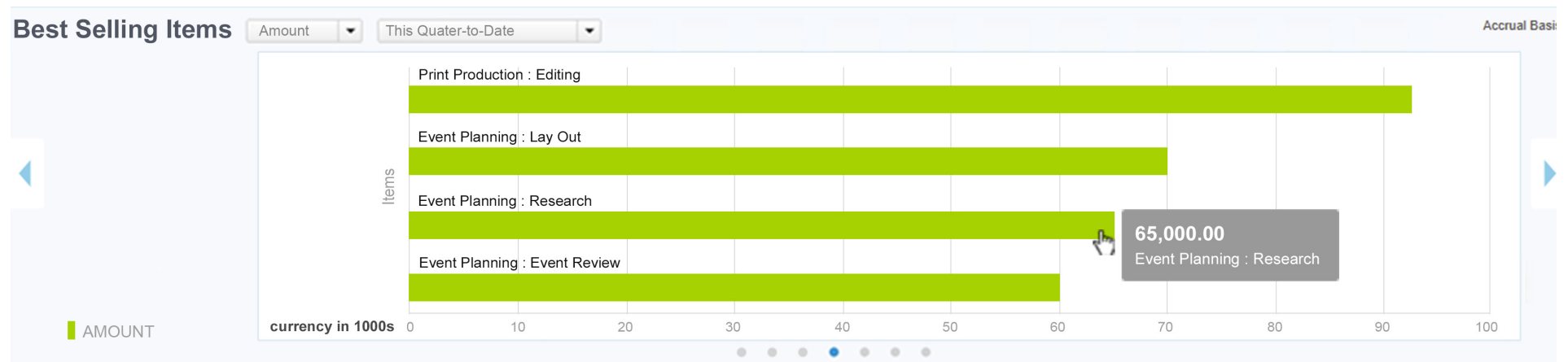
Explorations :



Challenges :

Redesigning this graph posed a challenge of managing negative space well. The existing graph is fitted in a small real estate. Suddenly shifting the same graph on a large scale was making it look empty. Since this graph is going to be the part of Insights Homepage which takes away the main real estate of the screen, it was important to take care that the graph does not leave too much of negative space and look complete.

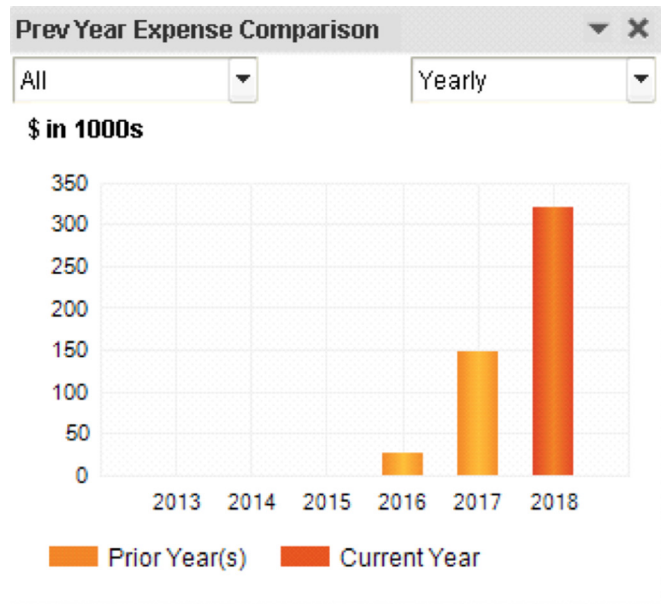
Visual Design Solution :



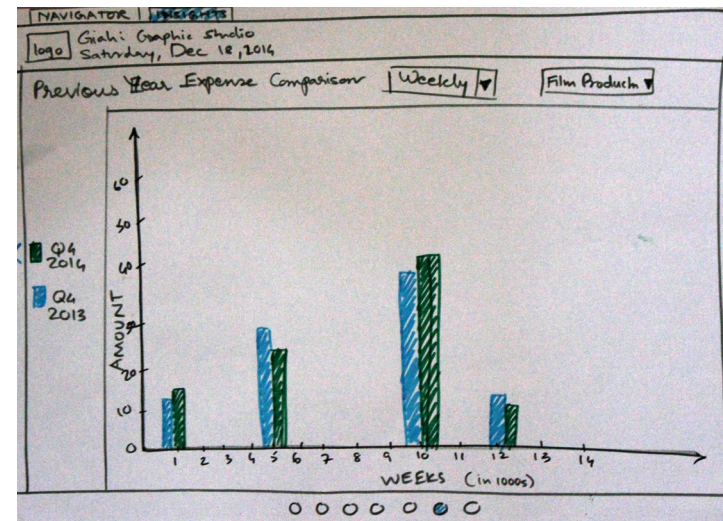
Graph Design 3 : Previous Year Expense Comparison

Design Goal : To let user compare his company expenses with previous years to understand the pattern of spending money.

Existing representation of 'Previous Year Expense Comparison' :



Explorations :



Challenges :

Transition from orange to blue color for bars in this graph involved lot of major decision making. This software has 25 years old customers and they are used to consider green color as income and blue color as expenses. Challenge is since their existing widget for this graph has orange color to represent expenses, it might confuse users between both the graphs, though they represent same data. Company accepted to use shades of blue for expense comparison and implement the same change in their widget as well.

Visual Design Solution :



Visual Specifications : Typography

Arial.

Arial is the soul system typeface for the entire Insights Initiative.

Arial Regular

The quick brown fox jumps over the lazy dog.

AaBbCcDdEeFfGgHhIiJjKkLlMmNnOoPpQqRrSsTtUuVvWwXxYyZz

\$@&?

Arial Bold

The quick brown fox jumps over the lazy dog.

AaBbCcDdEeFfGgHhIiJjKkLlMmNnOoPpQqRrSsTtUuVvWwXxYyZz

\$@&?





Visual Specifications : Color Palette

a6d201



4b98d0



4999ce



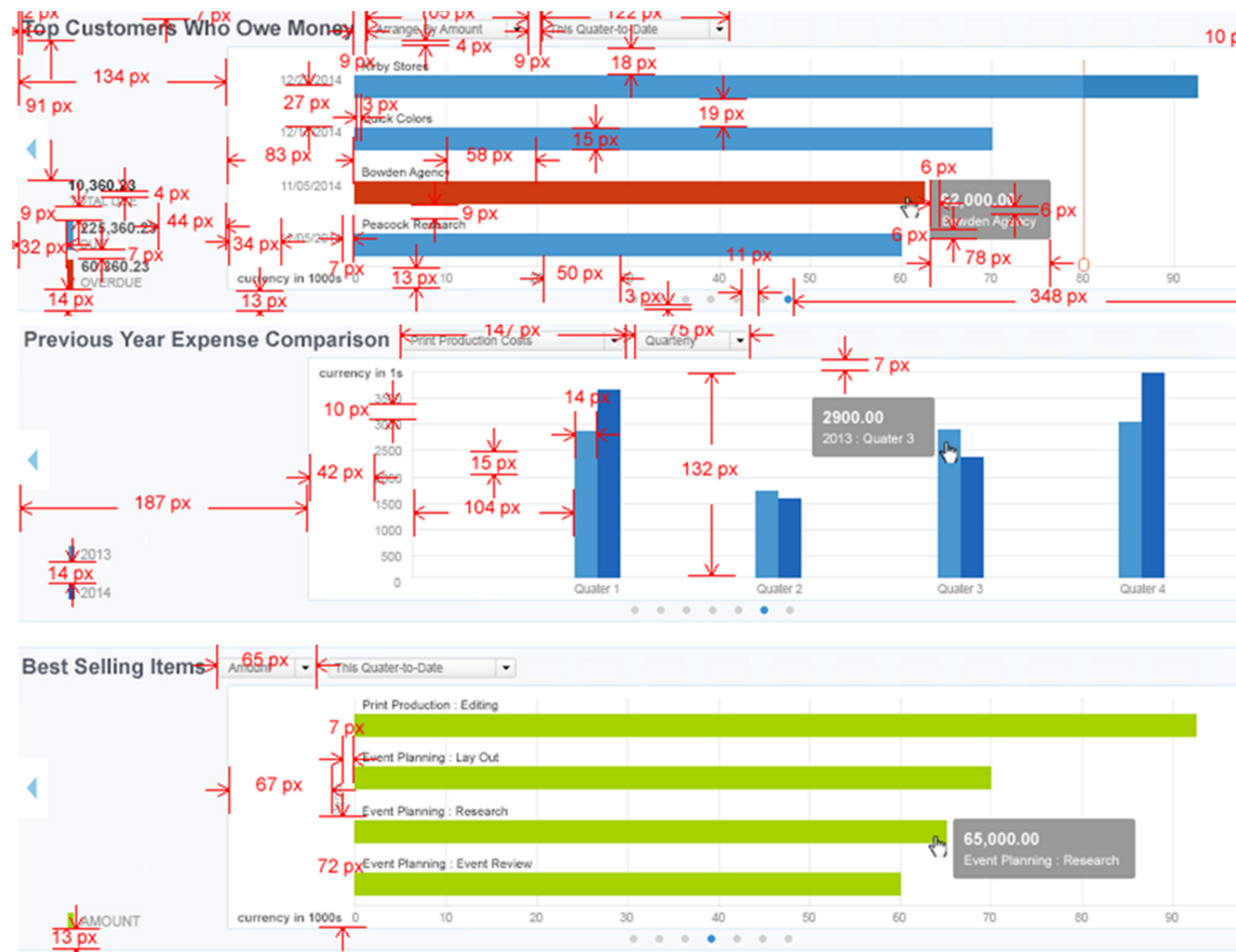
ce3b10



999999



Visual Specifications : Spacing



Project II

**Save As PDF Design for Insights
Homepage**

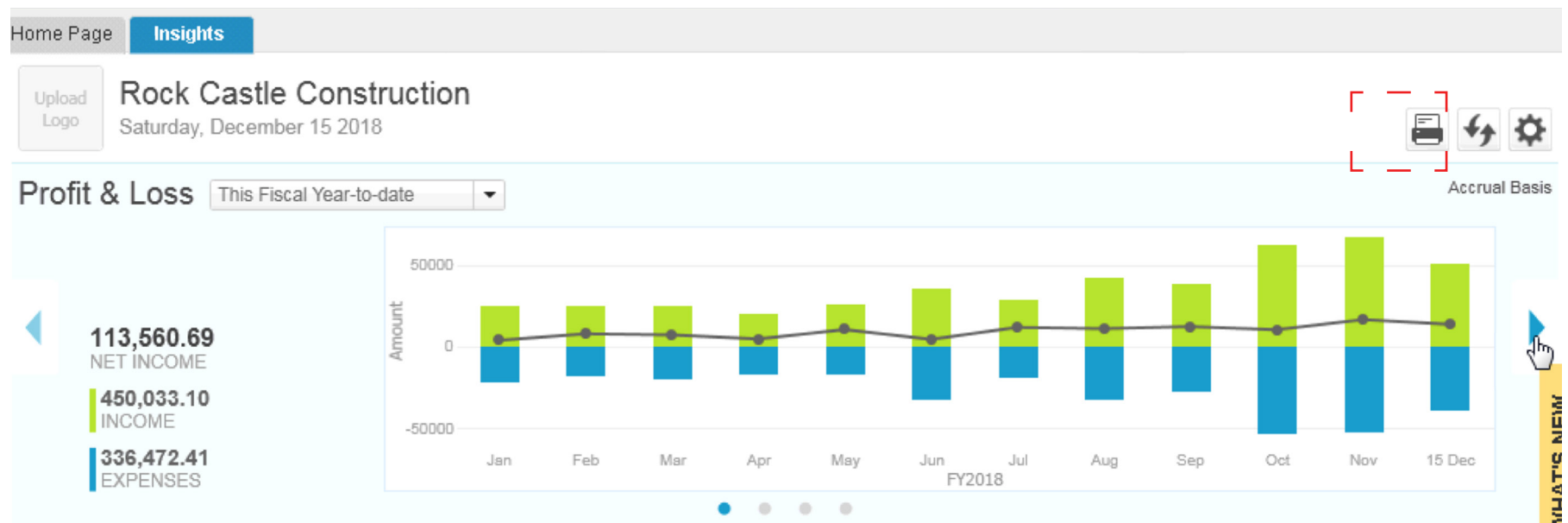
Save As PDF Design for Insights Homepage

Design Goal : Data sharing in a readable and consumable format.

Customer Benefit Goal : User will now be able to Share the insights data.

Task : To design an end to end experience for Save As PDF initiative for Insights

Description : Presently, if the user hits save as PDF, whatever content he sees on the screen gets on to the save as PDF page which is unwanted content. For Example : Filter next to the title, carousel indicators, previous and next arrows come as it is on the save as PDF page. This part of the product is not really touched by any designer before. It needs to be designed from the scratch.



Design Principles :

No ambiguity

Establish a familial resemblance by driving consistency and integration in the experience to keep the journey seamless, familiar and harmonious.

Easy to consume

Looking at the PDF, user should get a clear idea of what the document is about and what all it contains.

Consistency

No change in existing long established experiences with less than awesome new experiences.

Flexibility

User gets the freedom to print PDF in both Portrait and Landscape orientation. Layout will modify accordingly.

Usage Frequency

Lessening the amount of time and energy required in understanding the data. Lessening the usage of substrate and ink.

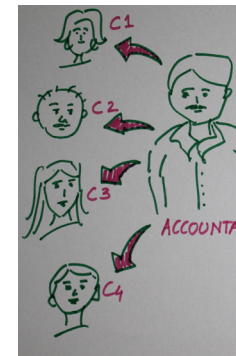
Content

It should accommodate all the required information.

User Stories :

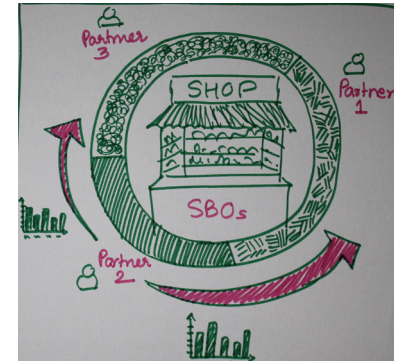
Accountant sharing Insights with his client :

He keeps daily records of the business trends of his client and wants to communicate it to the client.



SBO sharing Insights with his pro advisor :

To have an advice on a specific area of his business, he shares the Insights with his accountant.

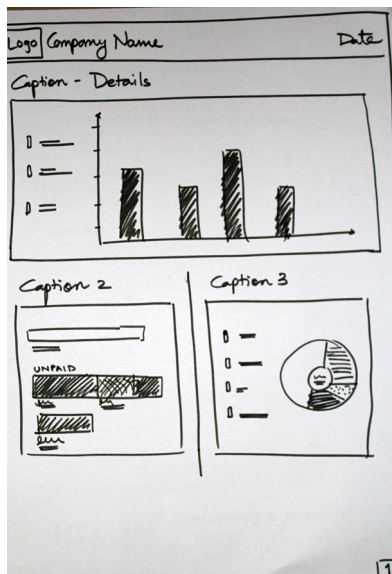
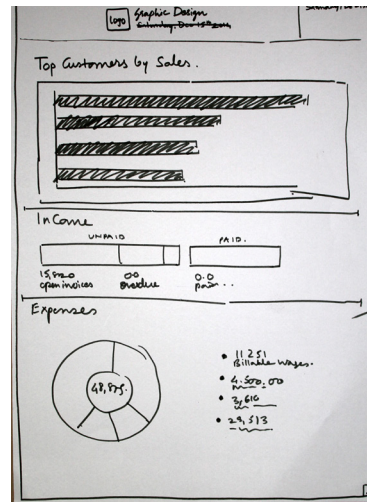
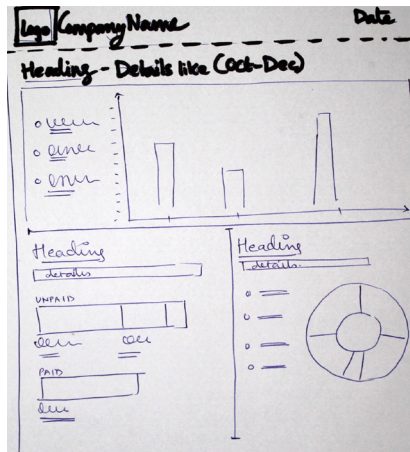


Co-owner shares Insights with his partners :

Shares insights with his partners to keep them for future reference.



Explorations :

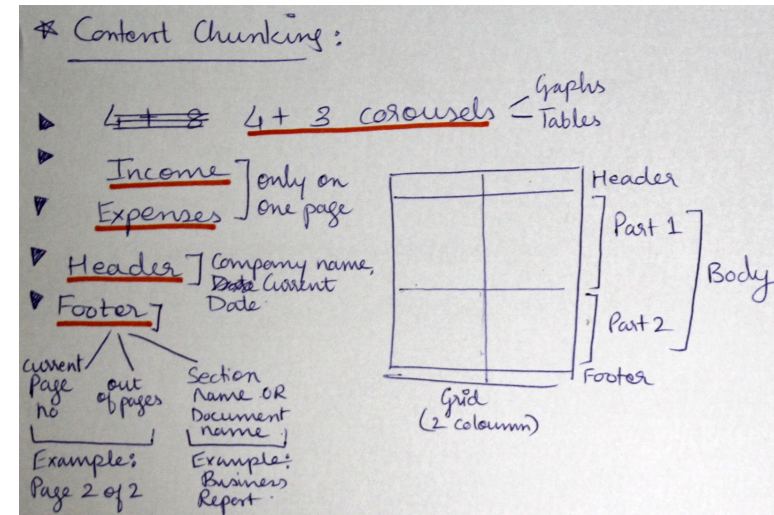


Content Chunking :

Content chunking will help to establish heirarchy between elements. It will make page more clear and scannable. It will help users find specific information quickly and easily.

Information that needs to be accomodated on the Save As PDF page

- 4 Graphs + 3 New Graphs
- Income Tracker
- Expenses Tracker
- Logo and Company Title
- Company Information
- Time Period for graph
- Page Numbers
- Document Type
- Accountant Info

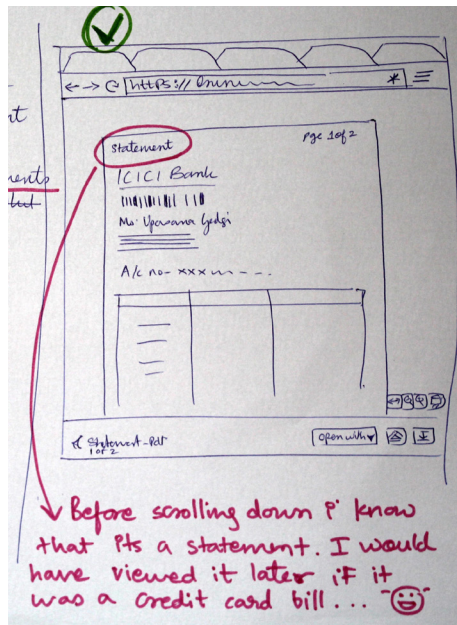


Design Rationale :

Document Type

User gets a clear idea of what kind of a document he is looking at.

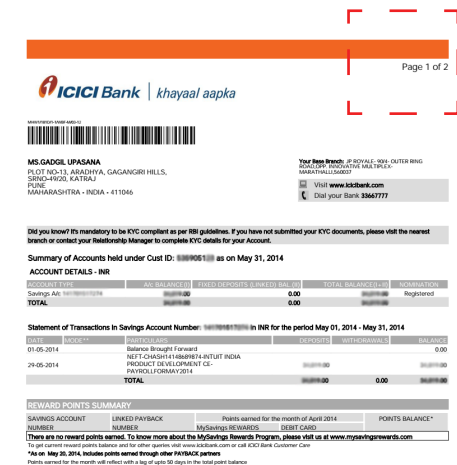
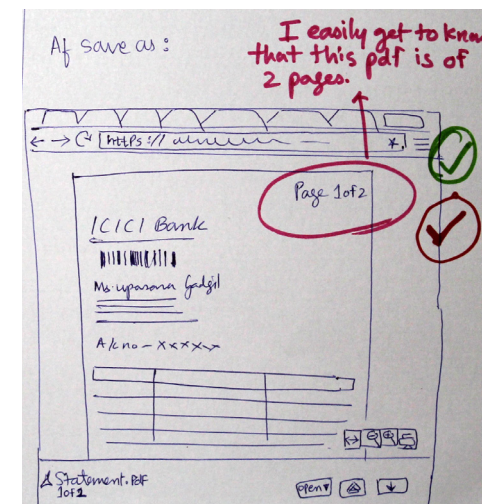
- User might receive 10 different documents from various people via mail or post throughout the day.
- Attachments in mails are not properly named all the time.
- Mentioning document type would help the user to save his time in going through the document to understand what it is.
- At top left corner he will see the document type and then decide whether to view it immediately or later. For example, some people postpone viewing bill statements from bank



Page Number

Lets user know how long is the document.

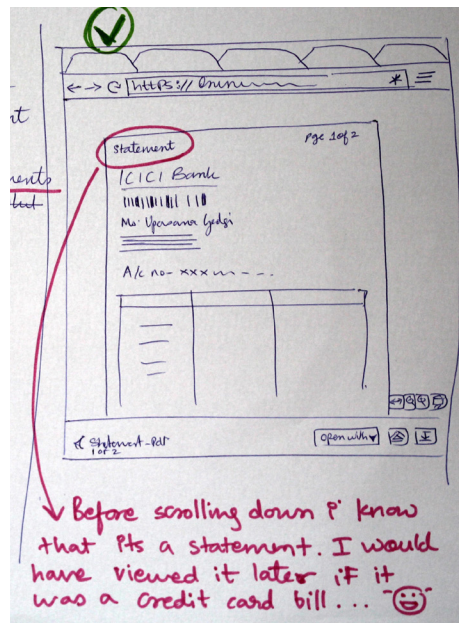
- While saving, printing or emailing if user is interested in viewing pagenumbers, top right corner is the most visible area. He does not need to scroll the whole page.
- Effort of scrolling will be saved.
- Important documents like bank statements will generally display dates on top corners of the page.



Accountant or SBO Information

Information like accountant/SBO name, company name, contact number, office address, email address, website at the end of the document.

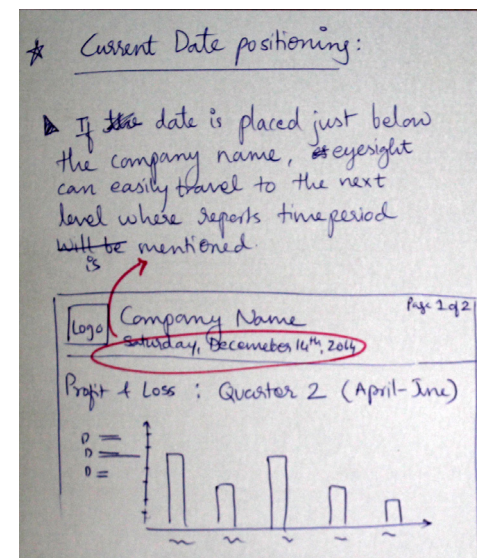
- This information will work as branding for accountant.
- Accountant's client will not have to go here and there to find his contact details to understand the report. He can look at the info below and right away call him up.
- Similarly, SBO's information at the bottom would help accountant to refer to it whenever he is studying his clients documents. Moreover, accountant can manage any number of accounts. It is time consuming to find each of his clients contact info always.



Document Date

Helps user to know when was the document printed.

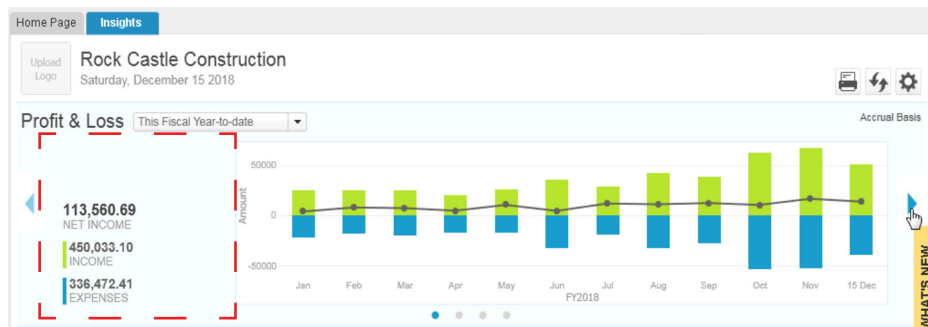
- Date positioning should be such that user will understand if the document is latest or old and how old.
- SBO's and accountants always arrange documents by date.
- When documents are filed, only right side of the pages is free. Its easy to turn pages partially. Hence, date on top right makes sense.
- It helps in categorization of documents.



Color Legend

To understand the graph, its important to know which color represents what.

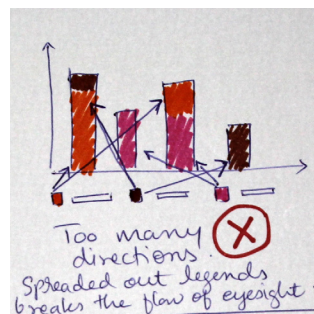
- Present placement of color legend leaves so much whitespace.



Explorations

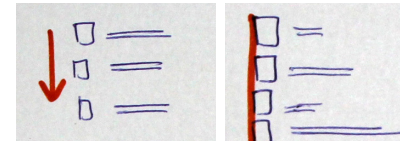
Legend Placement 1 :

- This arrangement saves negative space.
- According to the study of usability, reading downwards is easy to eyes and lessens time required for it.
- Eyesights movement is going too to and fro.
- Moreover, eyesight has to travel in many different angles of the main axis.

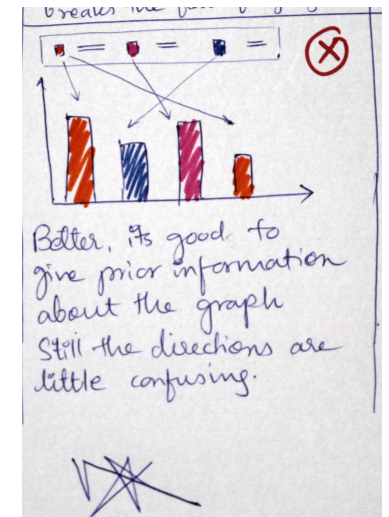


Legend Placement 2 :

- This arrangement definitely gives context of the graph.
- According to the study of usability, reading downwards is easy to eyes and lessens time required for it. See below.

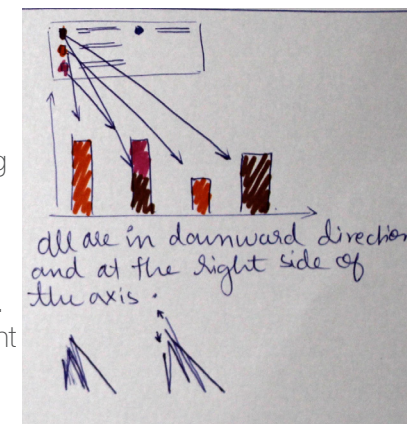


- But this arrangement takes more time.
- Eyesights movement is going too to and fro.
- Moreover, eyesight has to travel in many different angles of the main axis.



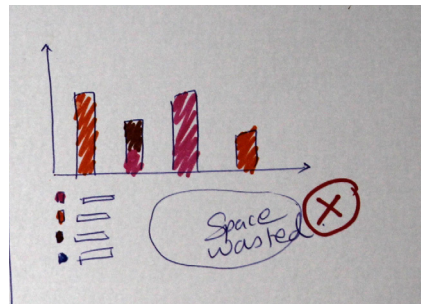
Legend Placement 3 :

- This arrangement gives context of the graph.
- According to the study of usability, reading downwards is easy to eyes and lessens time required for it.
- Eyesights movement is going too to and fro but it is only in one side of the main axis.
- But lot of whitespace is wasted on the right side of the legend.



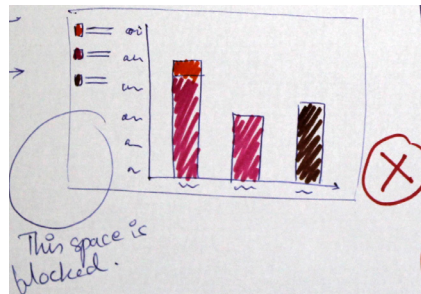
Legend Placement 4 :

- Regular users are familiar with the color legends. Its not really needed to place legends before or above the graph.
- Its easy to scan legends here
- But lot of whitespace is wasted on the right side of the legend.



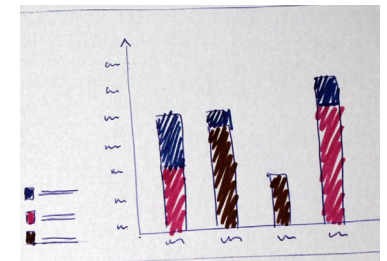
Legend Placement 5 :

- Regular users are familiar with the color legends. Its not really needed to place legends before or above the graph.
- Its easy to scan legends here
- But lot of whitespace are blocked.
- According to principles of design, space should flow. There should not be unnecessary blockages.
- This placement is good if more legends are to be added in future.



Legend Placement 6 :

- This arrangement definitely gives context of the graph.
- Reading downwards is easy to eyes and lessens time required for it.
- Eyesights movement is going from left to right which is according to normal human reading habits.
- Space is not blocked.
- Its possible to fit more legends in future.



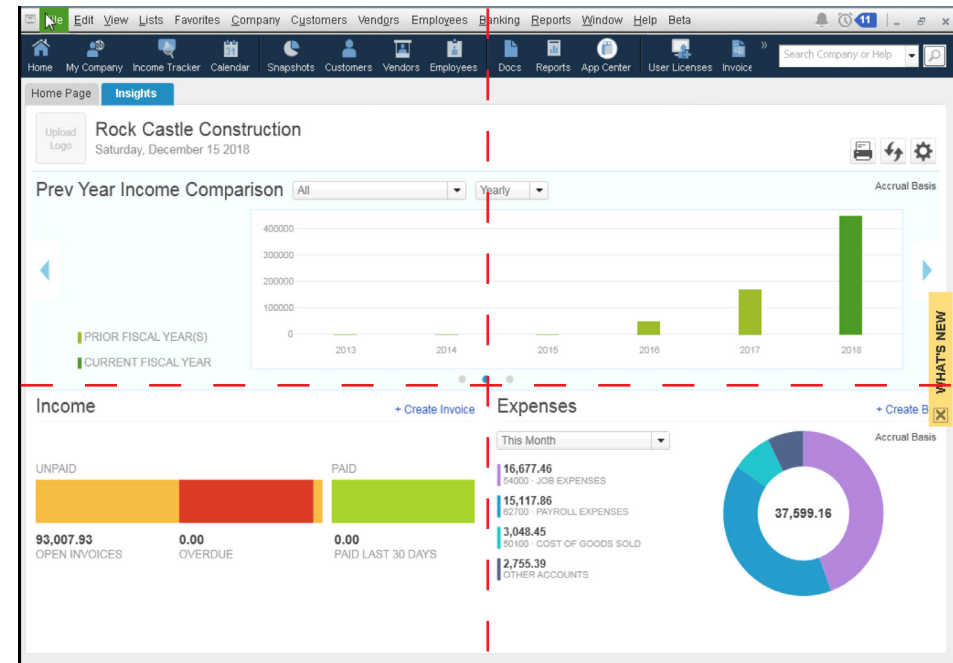
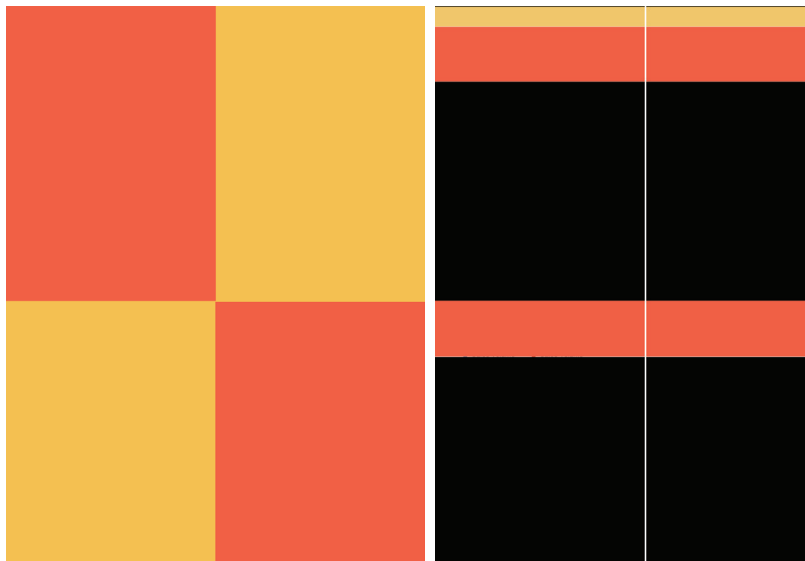
Grid

It is a method of creating organization in design.

- A consistent grid will help to create visual identity, regardless of who puts together the actual design.
- It is helpful in establishing a hierarchy between elements.
- Chunked content can be easily placed into the grid.

2 Coloumn Grid :

- Consistent with the Insights Page view
- Clear and scannable
- Helps build visual identity
- Convenient to visually produce different concepts



Saturday, December 15, 2018



Glahi Graphic Design Studio

Profit & Loss - Quarter 4 (Oct-Dec)

10,360.23
NET INCOME

72,227.50
INCOME

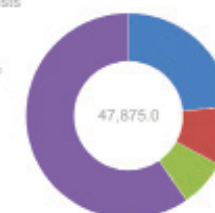
61,867.37
EXPENSE



Income



Expense - Current Year (2014)

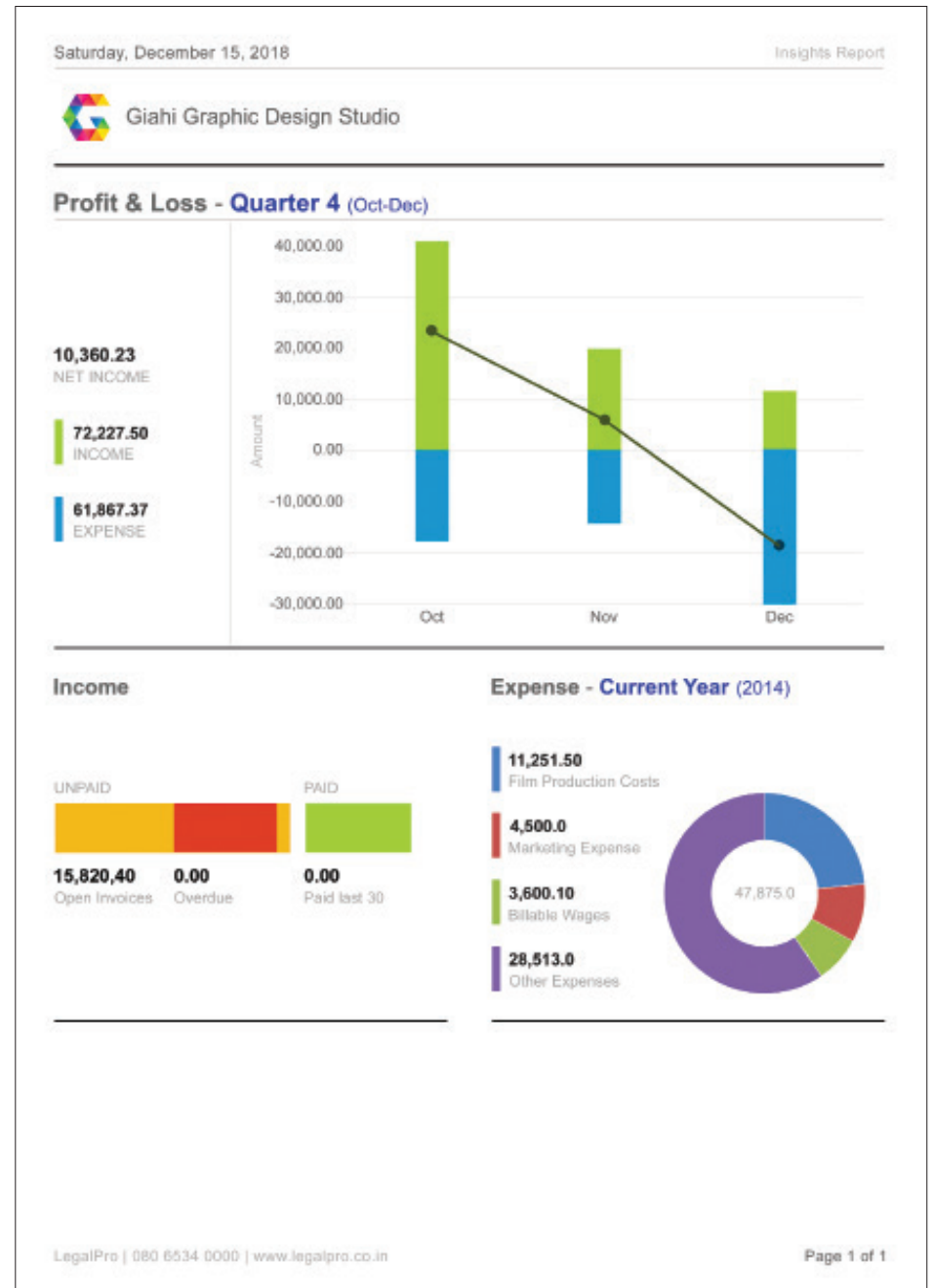


Design Option 1 :

- Plain blue patch is causing more usage of ink.
- This would cause user to spend more money on ink which is not desired.
- Real estate at the bottom is wasted. It can be used effectively.
- Real estate in header section is wasted.
- Users are more interested in seeing date than document type.

Design Option 2 :

- Black lines are too bold.
- Too many horizontal lines are used as design elements.
- Real estate at the bottom is wasted. It can be used effectively.



Design Option 3 :

- Again, Plain blue patch is causing unnecessary usage of ink.
- Users take more than 25 prints daily. In this case to them even these small blue patches make a lot of difference in terms of money.
- Real estate at the bottom is wasted. It can be used effectively.

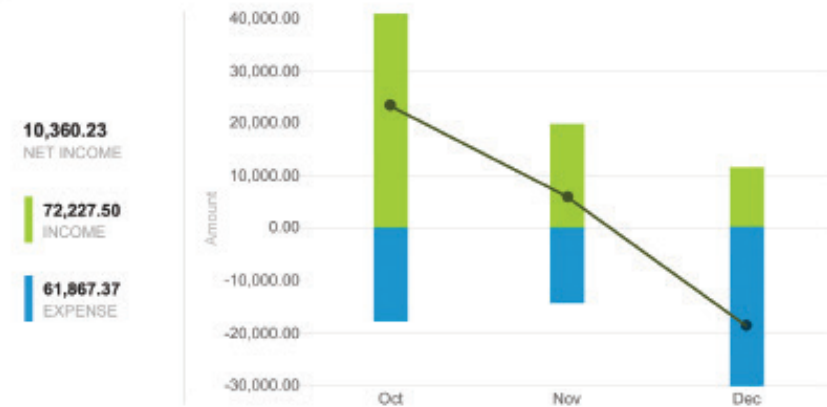
Saturday, December 15, 2018

Insights Report



Giahi Graphic Design Studio

Profit & Loss - Quarter 4 (Oct-Dec)



Income



Expense - Current Year (2014)



Design Option 4 :

- Association of graph title and color legend is more than compared to the association of color legend with its graph.
- Majority users of this product are already familiar with color legends, hence in this case, giving colour legends the prime area in the real estate makes less sense.
- Blue color is associated with Expenses. Hence, blue color for 'Top customers by sales is wrong'.
- Date and Document type is taking away more attention.
- Time period mentioned for each graph should be more detailed.
- Too many horizontal lines are used as separators.
- Details like currency needs to be mentioned.

Saturday, December 15, 2018

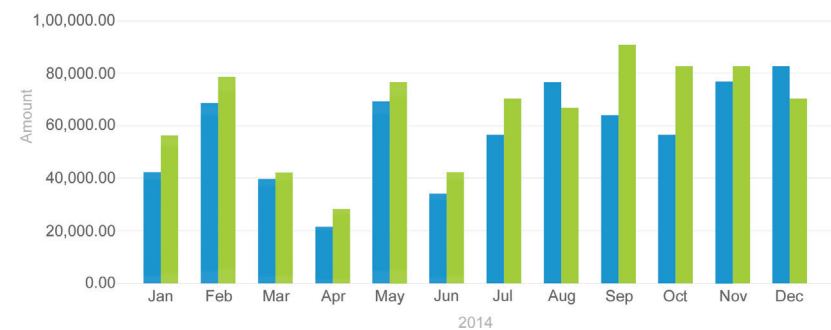
Insights Report



Giahi Graphic Design Studio

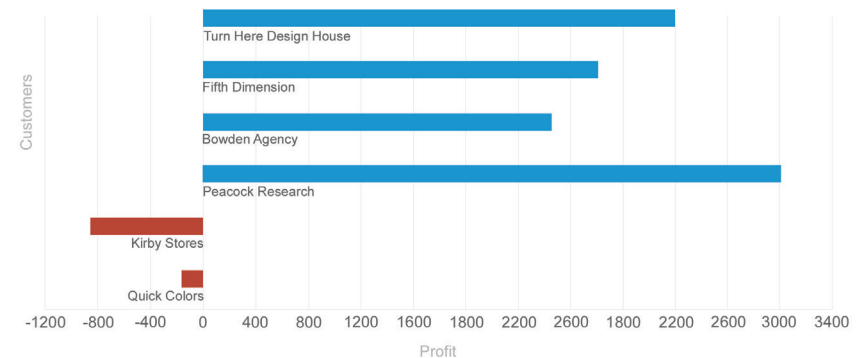
Income & Expenses - Current Year (2014)

10,360.23 Net Income
72,227.50 Income
61,867.37 Expense



Top Customers by Sales - Current Year (2014)

61,867.37 Sales Volume
61,867.37 Sales Volume



Final Design Solution : Page 1

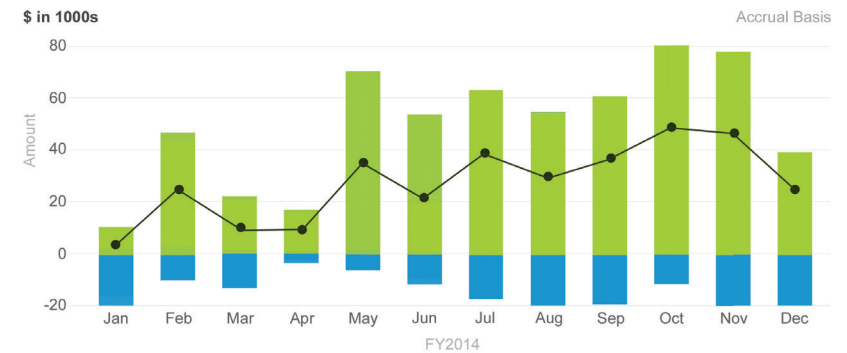
- Looks clean
- Easily Scannable
- Information is clear and crisp
- Not causing unnecessary use of ink
- White space used as separators



Giahi Graphic Design Studio

Saturday, December 25, 2014

Profit & Loss - Jan 01, 2014 to Dec 24, 2014



10,360.23

Net Income

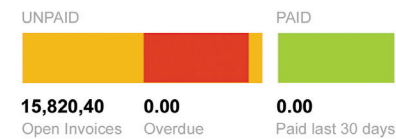
72,227.50

Income

61,867.37

Expenses

Income



Expenses - Jan 01, 2014 to Dec 24, 2014



Final Design Solution : Page 2

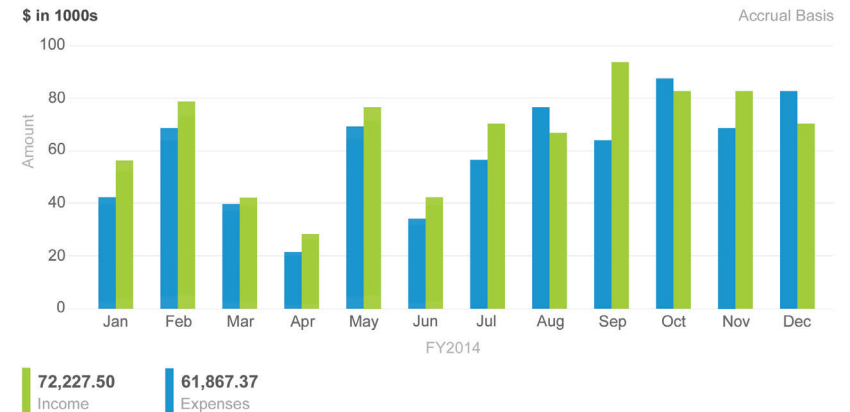
- Looks clean
- Easily Scannable
- Information is clear and crisp
- Not causing unnecessary use of ink
- White space used as separators



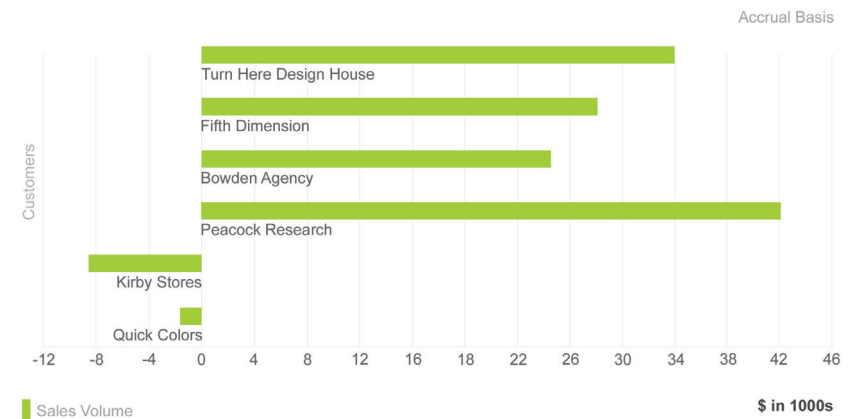
Giahi Graphic Design Studio

Saturday, December 25, 2014

Income & Expenses - Jan 01, 2014 to Dec 24, 2014



Top Customers by Sales - Jan 01, 2014 to Dec 24, 2014



Visual Specifications : Typography

Arial.

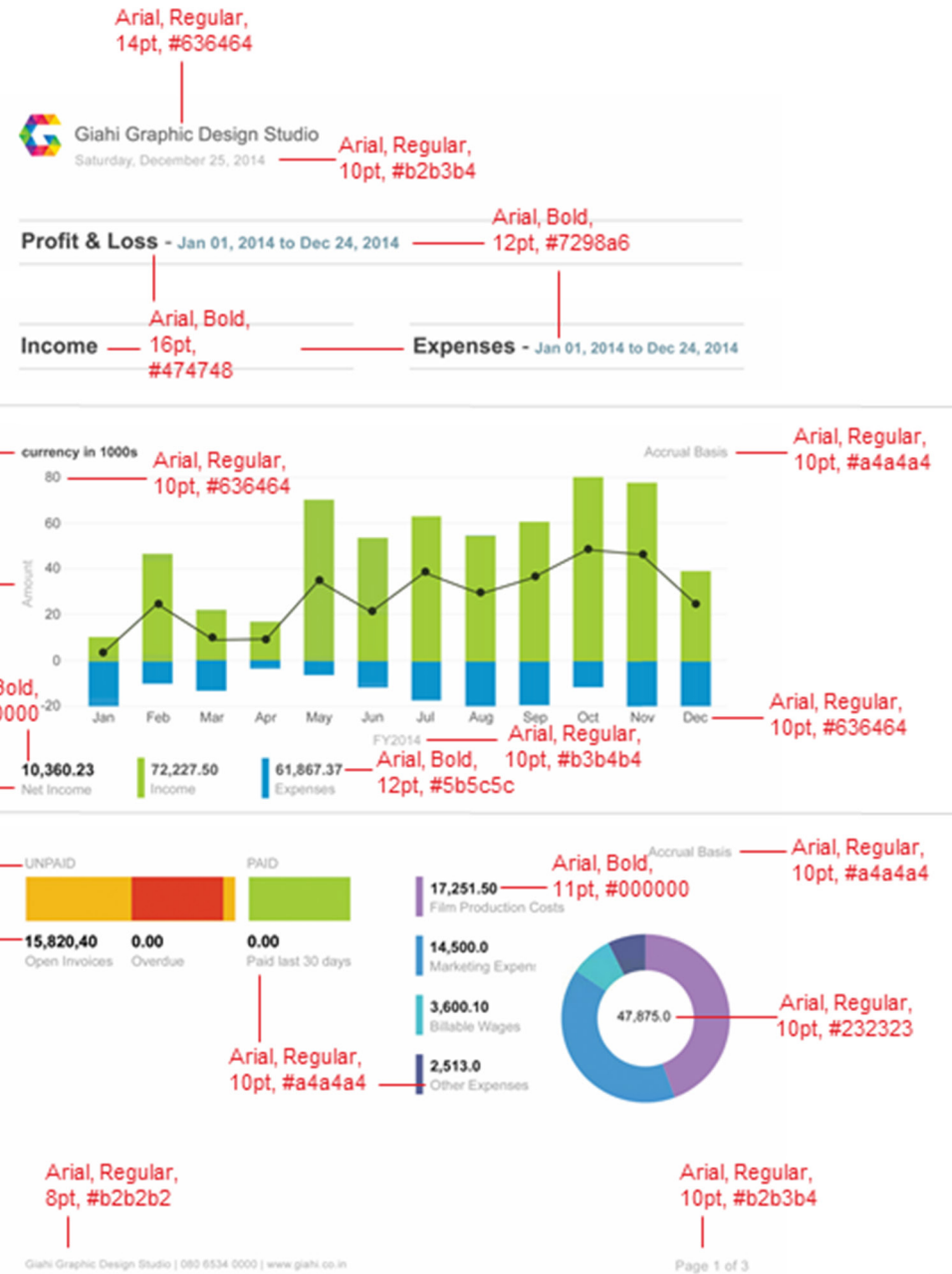
Arial is the soul system typeface for the entire Insights Initiative.

Arial Regular

The quick brown fox jumps over the lazy dog.
AaBbCcDdEeFfGgHhIiJjKkLlMmNnOoPpQqRr
SsTtUuVvWwXxYyZz \$@&?

Arial Bold

The quick brown fox jumps over the lazy dog.
AaBbCcDdEeFfGgHhIiJjKkLlMmNnOoPpQq
RrSsTtUuVvWwXxYyZz \$@&?



Visual Specifications : Color Palette

a6d201



50bd04



4b98d0



0095cc



a27eb8



576095



de3e27



f3b91b



789eac



c6c6c5



Giahi Graphic Design Studio

Saturday, December 25, 2014

Profit & Loss - Jan 01, 2014 to Dec 24, 2014



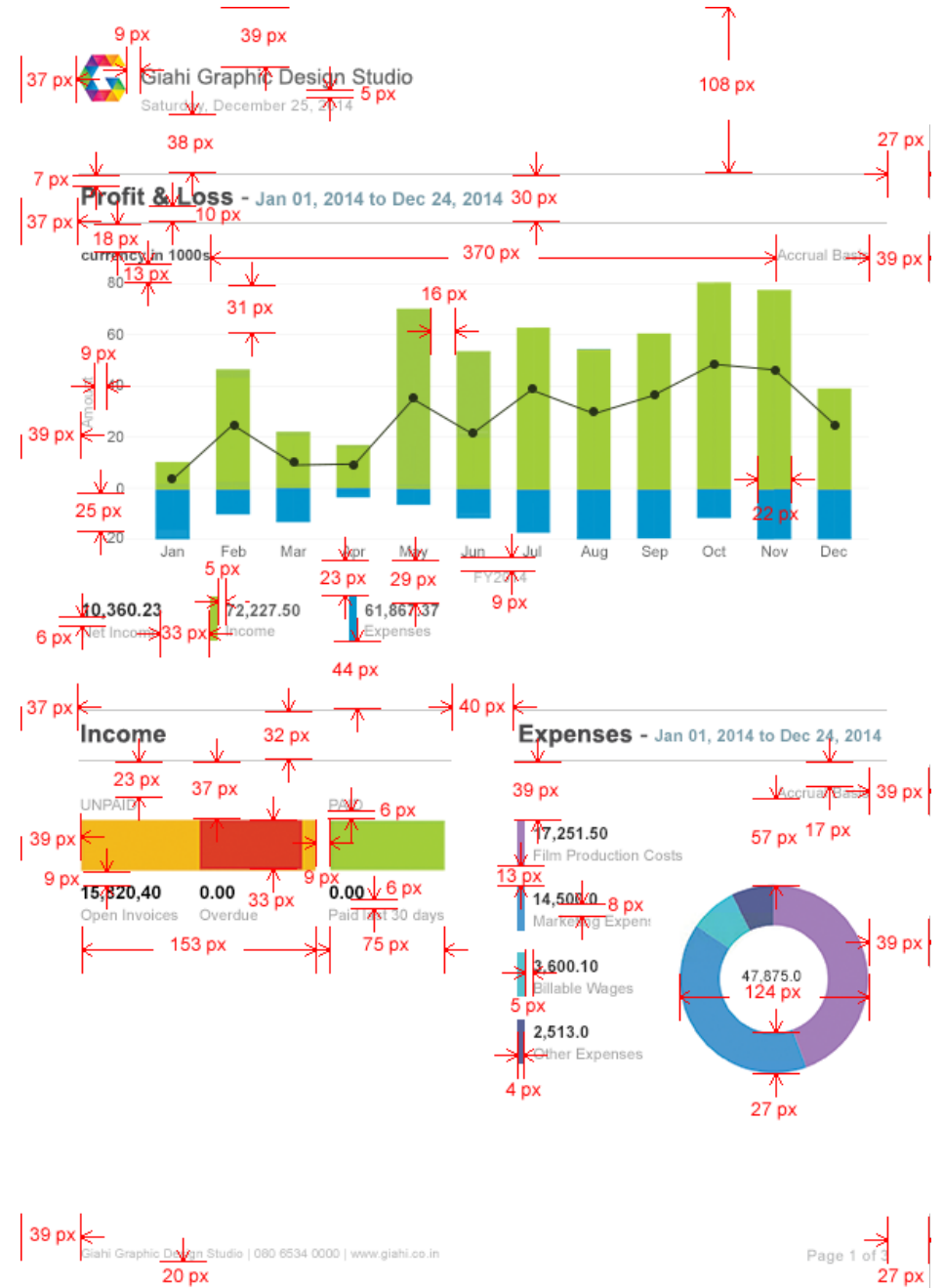
Income



Expenses - Jan 01, 2014 to Dec 24, 2014



Visual Specifications : Spacing



Project III

Poster Designs for Intuit Branding

Poster Design for Intuit Branding

Design Goal : To enhance Intuit Branding through designing a small part of the whole campaign

User Benefir Goal : To let Intuit employees, visitors and clients understand the design that Intuit follows.

Task : To design posters on design principles followed by Intuit

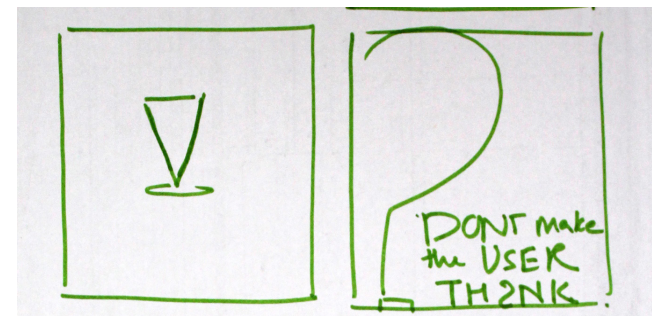
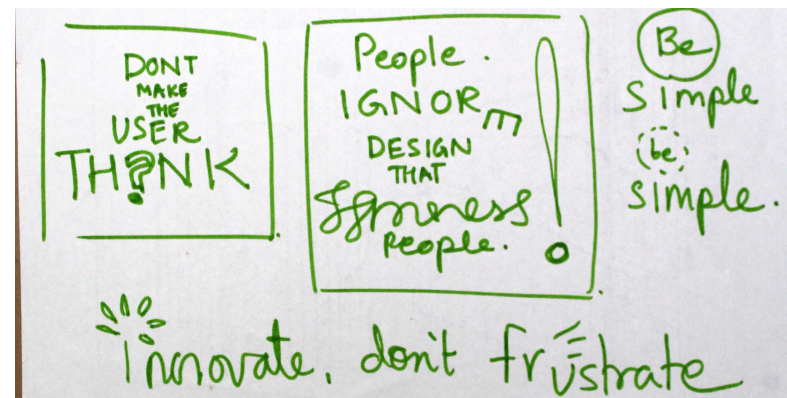
Description : People on every floor of a huge building are busy throughout the day doing meetings. These posters should give them a visual retreat as well as remind them of the design principles being that Intuit wants its teams to follow always. To attract their attention from a busy schedule, posters need to be really attractive. Since all are not from creative background but work on the product design daily by playing different roles I came up with an idea of associating day to day life products to Intuit's Design Principles.

Explorations

- Needle
- Pen
- Swiss Knife
- Kettle
- Chair
- Safety Pen
- paperclip
- Key
- Human body
- button
- western commode

- Simple to use designs are complicated to make. - Rubix Cube.
- The most complicated skill is to be simple
- Simple is Hard.
- Design is born out of necessity.
- coca cola bottle - Design speaks louder than words.
- design should be userfriendly - w.c. design builds
- Rational design lasts forever. Example - human body.
- design should be simple to use.
- great designs are universal innovations

- ✓ Don't Make the user think
- Design is how it works.
- Keep it Simple
- ✓ people ignore design that ignores people.
- Designing a product is designing a relationship
- Simple is good.
- ✓ design is an experience. - W.C.
- Best design is that which never change with time.



Poster 1 : Dont Make The User Think

Design Principle :

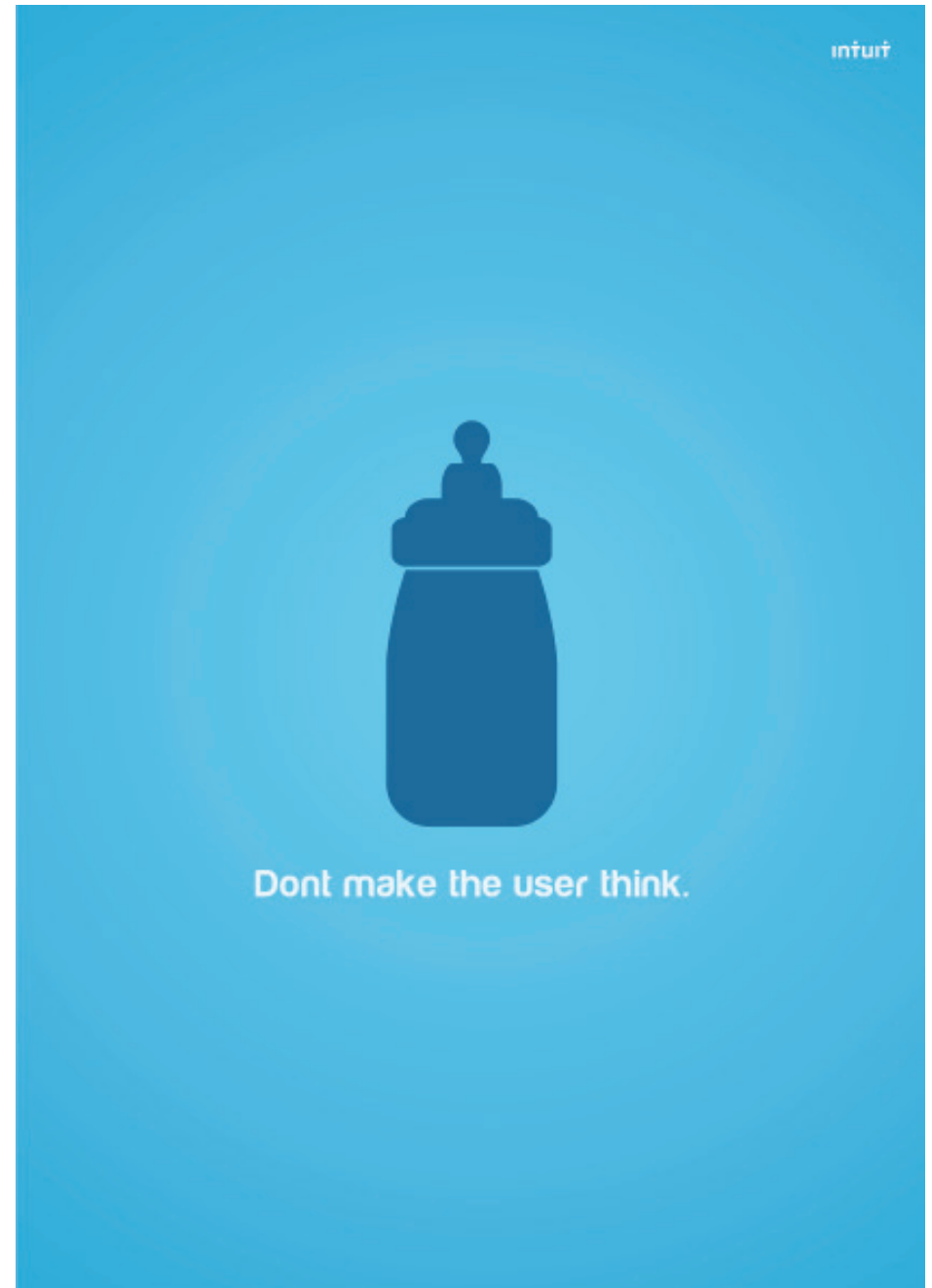
Remove ambiguity and make it easy to use



Poster 2 : Dont Make The User Think

Design Principle :

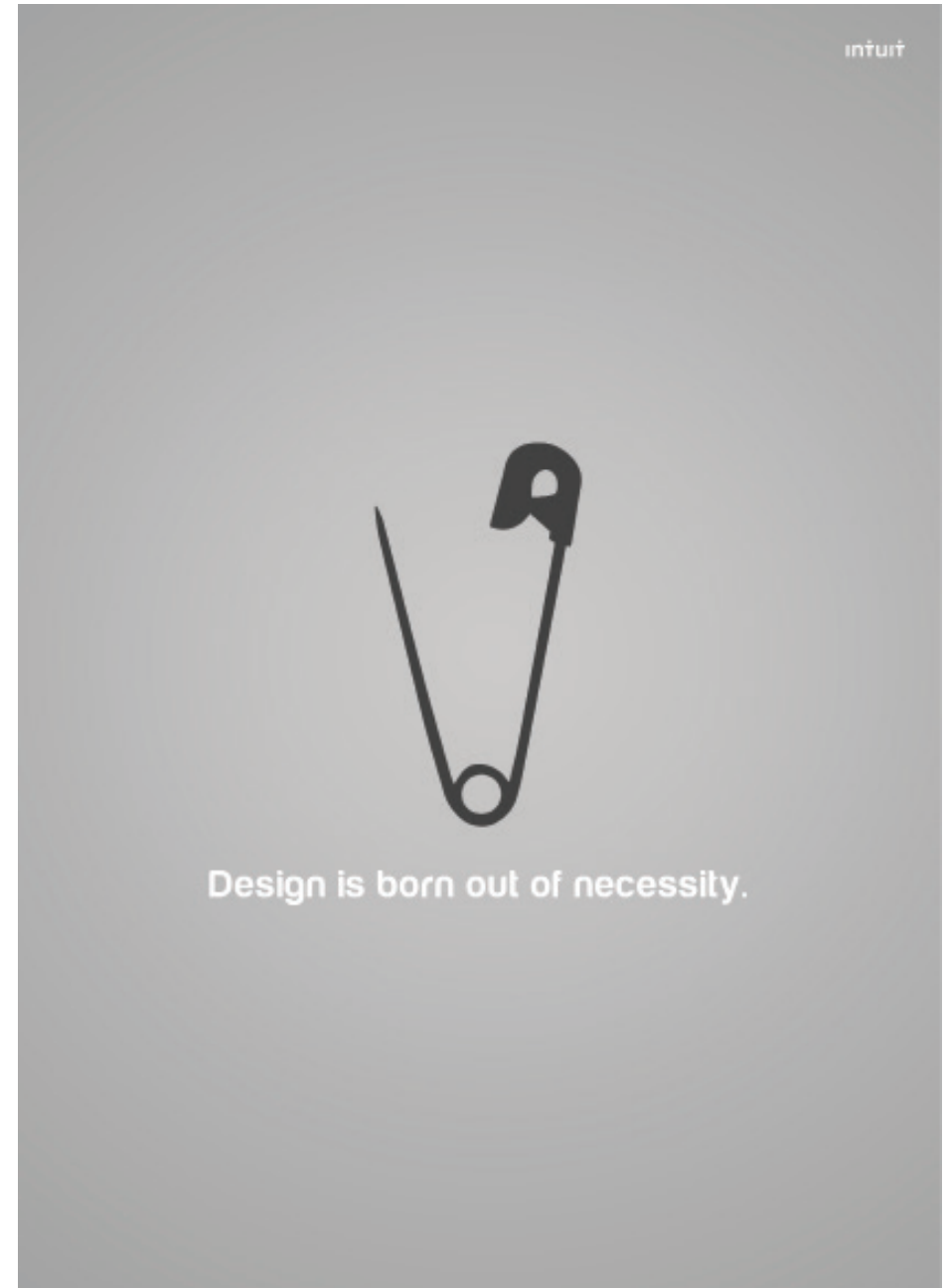
Remove ambiguity and make it easy to use



Poster 3 : Design Is Born Out Of Necessity

Design Principle :

- Innovate, dont frustrate
- Great designs are universal innovations



Learnings

Insights Homepage was a very new kind of a project that I worked on. I could implement my learnings from DC in this project. It helped a lot. My work at Intuit was appreciated by the whole team and it has already gone for the product release. All this is due to the knowledge that I have gathered through my college assignments. In IDC, in one of our modules called Communication Design, I learnt about content chunking, group associations, grids, content articulation which I practically used in my internship work. To prove your design it's very important to have strong design rationale. And this course helped me develop my reasoning power to prove my work. As I worked, I made a point to question myself on each stage of designing as why am I putting this line or why am I leaving this space empty. It helped me design logical ideas and visuals which when explained are easy to grasp for others in the team as well. Typography plays a great role. Deciding the type of font to be used is a big decision.

Design is a service to others. Hence, as a designer I had to think of the user and his needs and habits. I always kept in mind that I should not give him less than awesome experiences. While designing Insights Homepage, I went through Voice of customer reports i.e. the feedback about the product and its features from its clients to understand what problems were faced by the users earlier so that I can never repeat those mistakes in my new designs.

Working in a team with people from non creative background, making them understand your view point was a big challenge. Adhering to deadlines and coming up with designs at the same time was another challenge. Besides all these challenges, it was a great experience to work with senior designers and understand their design philosophy.

I did not only design but also presented my design solutions in front of the Director of the product in Mountainview. I realized if you represent your work well, half of the battle is won there itself.