

Localize the Openbravo ERP system into Sinhala language and Implement it with the university system.

Project ID: 16-071

Project Proposal

B.Sc. Special (Honors) Degree in Information Technology

Submitted on 08-03-2016

Localize the Openbravo ERP system into the Sinhala language and Implement it with the university system.

Project ID 16-071

Authors:

Student ID	Name	Signature
IT13078492	Ekanayaka W.K.S.P	
IT13087616	Gamage Y.M.K	
IT13074050	Chathurangi K.P.B.B	
IT13104436	Chathurangani Y.M.A	

Supervisor

.....

Dr.Rohan Samarasinghe

Co-Supervisor

.....

<Name of the Co-supervisor>

DECLARATION

We declare that this is our own work and this project proposal does not incorporate without acknowledgement any material previously submitted for a Degree or Diploma in any other University or institute of higher learning and to the best of our knowledge and belief it does not contain any material previously published or written by another person except where the acknowledgement is made in the text.

.....
Ekanayaka W.K.S.P

.....
Gamage Y.M.K

.....
Chathurangi K.P.B.B

.....
Chathurangani Y.M.A

ABSTRACT

In here we are going to localize openbravo Enterprise Resource Planning (ERP) system into Sinhala language and implement it into the university system. So when a business is going on there should be a good business management system. ERP is the solution for that. The value of openbravo ERP is open source ERP system that enables one to considerably optimize relevant operations and heighten profit solutions and at the same time improving margin base for the common good of a company. We adapt that openbravo ERP translating to Sinhala language. The method of translating relevant details of openbravo ERP into different language is called as localization. In here we are recognized openbravo ERP system through its module and adding university resources details through Netbeans IDE. According to that we build university ERP system by using modules such as master data management, financial management, production management and procurement management. As the next step localize the built ERP into Sinhala language. As this procedure anticipated outcome is implementing the localized ERP system into university.

Contents

1. INTRODUCTION	6
1.1. Background	6
1.2 Literature Review	8
1.3 Research Gap & Research Problem	9
2. OBJECTIVES	11
1.1. Main Objectives	11
1.2 Specific Objectives	12
3. RESEARCH METHODOLOGY	14
Master Data Management key concepts	17
4. DESCRIPTION OF PERSONAL AND FACILITIES.....	27
5. BUDGET	28
6. REFERENCES	29
7. APPENDICES	30

1. INTRODUCTION

1.1. Background

ERP is a category of business management software .That means when a business is going on it should be much profitable while maintaining corporate social responsibility. Managing a business in the right way isn't an easy job. Because there are number of activities regarding with business such as human resources, financials marketing and sales, Inventory management, manufacturing or sales delivery, shipping and payment so on. So ERP should be fully integrated real time system giving the information we need to grow the business because ERP performs as shared database and shared platform supporting various business activities simultaneously. As well as number of compelling reasons are there regarding with ERP such as real time information for decisions, best practice procedures, improved visibility, faster month- end close, increase customer satisfaction, manage and control costs, balance of supply and demand and so on.

In here we use openbravo ERP system to localize into Sinhala language and do the implementation. Since openbravo is world famous commercial open-source software and it has number of features to increase its accuracy and reliability, we decided to localize and implement openbravo ERP software. It was the first product launched by openbravo and a client-server software application (web based) for small and medium scale companies.

Openbravo provides services for partners for their success we can mainly categories into five section They are business services, technology services, leadership programs , quality assurance services and education and support services.

When consider about the features of the openbravo supply chain management, multi-channel management, enterprise management, reporting and analytics, mobile web and cloud platform and web point of sale.

In openbravo localization, translate the content of ERP system into our mother language. In addition, specific local adaptations too many languages and regions are available using modules created by openbravo and its community of localizer. When we mention about the localization modules cover capabilities. We can provide language transaction, chart of accounts, accounting rules, tax configurations, fiscal reports, bank interfaces. Also many of regions and cities support for local and regional business practices. As well as consider about the localization projects.

Some countries have already localized openbravo ERP system into their own languages. Argentina, Australia, Austria, Brazil, Canada, China are the some of them. These countries successfully localized that openbravo ERP. They have done that localization for small-scale, medium-scale and large scale organizations. The categorization is depending on stage of development of a particular country. Some of categorizations are as below.

India

The Indian government defined the size of micro, small, and medium enterprises as below.

(a) In the case of the enterprises engaged in the manufacture or production of goods pertaining to any industry specified in the First Schedule to the Industries.

(i) A micro enterprise, where the investment in plant and machinery does not exceed twenty-five lakh rupees;

(ii) A small enterprise, where the investment in plant and machinery is more than twenty-five lakh rupees but does not exceed five crore rupees; or

(iii) A medium enterprise, where the investment in plant and machinery is more than five crore rupees but does not exceed ten crore rupees;

(b) In the case of the enterprises engaged in providing or rendering of services, as—

(i) A micro enterprise, where the investment in equipment does not exceed ten lakh rupees;

(ii) A small enterprise, where the investment in equipment is more than ten lakh rupees but does not exceed two crore rupees; or

(iii) A medium enterprise, where the investment in equipment is more than two crore rupees but does not exceed five crore rupees.

United Kingdom

In the UK a company is defined as being an SME if it meets two out of three criteria: it has a turnover of less than £25m, it has less than 250 employees, It has gross assets of less than £12.5m.

The Department for Business Innovation and Skills estimated that at the start of 2014, 99.3% of UK private sector businesses were SMEs, with their £1.6 trillion annual turnover accounting for 47% of private sector turnover.

In order to support SMEs, the UK government set a target in 2010 "that 25% of government's spend, either directly or in supply chains, goes to SMEs by 2015"; it achieved this by 2013.^[14]

As mentioned above up to now there are twenty three countries have used this Openbravo ERP system. So by considering universities of Sri Lankan there are many different areas such as computing, engineering, medical, business, financial and etc. Since that we can consider university system is also as a complicated one. Then consider it as medium-scale organization.

1.2 Literature Review

As we know ERP systems are becoming popular in medium and large scale organizations all over the world. Those organizations are interested in evaluating their business benefits in the short and long terms. If we summarized some of main benefits in a comprehensive way, we can find out main three features. Those are reducing inventories, shortening life cycle time and lowering cost. Those evaluations are based on due to the high cost of implementation the systems. Therefore last decade organizations around the world have made huge investments in ERP systems. As a human being always we try to find out the convenient way to solve any problem. Therefore to achieve high organizational performances most of the organizations join with implementing ERP systems. In the beginning of 1997 during the reengineering process, the method of ERP implementation was confirmed by many organizations all over the world. As the result of that most of the multi-functional organizations perceived many benefits. Those benefits can be divided into main five categories. Operational benefits, managerial benefits, strategic benefits, its infrastructure benefits and organizational benefits are above mentioned five categories. According to these details we can prove organizations can achieve a number of tangible and intangible benefits due to successful implementation of ERP. Also those benefits can help to organizations for meet the challenges with comprehensive way.[2]

As consider ERP implementation the very essential step is Gap Analysis which is the Gap between requirements of the company and the functions of ERP. If the implemented functions are not met the requirements of the company it will be a huge problem and it is not a right implementation. So in this research paper they have recognized Top management as the major

factor in critical success in ERP implementation. Higher ranking executives are (such as chairman, chief executive officer, managing director, executive directors) responsible for the entire enterprise. Top management translates the policy into goals, objectives and strategies and a shared vision of the future. It means decisions that affect everyone in the organization, and is held entirely responsible for the success or failure of the enterprise. Apart from that in ERP implementation major success factors, benefits, critical success factors, strategic factors, Tactical factors are the major features that they have recognized through this research paper. Further as they mentioned organization must work on according to clear objectives and goals by using implemented ERP. Also must have commitment of the top management by knowing and guiding the employees towards the goals and objectives. Always must give support to use the implemented ERP and must give a proper training to the staff by saying how to use it. It can be done by providing knowledge about newly allocated soft wares and hardware with ERP. [8]

In the ERP implementation there are fourteen critical failure factors. First one is System misfit due to poor ERP evaluation process ERP software. Found to be ill fitting with the business requirement to solve this problem changing the system program or write many management reports or conducting data transfer as a work around. Next one is High turnover rate of project team members as project team members suffer from high work stress and tremendous work load when coping the implementation. So some team members may realign from the job in the end users and project team members have insufficient ERP knowledge.[1]

1.3 Research Gap & Research Problem

There are so many ERP systems some of them are openERP, openERP5. In those systems there are so many limitations and disadvantages. Some of them are in openERP technical documentation is failed, openERP mixes of big developers centric documents with its API application so some information cannot find to the reviewers to analyze some of the Java document application in API. In openERP business may not be able to maximize the use of the application. Because of some reasons customers demand openbravo some of them are A dedicated, preconfigured instance running on a virtual server in the cloud, A dedicated, preconfigured instance running on a virtual server in the cloud, A Commerce Platform or ERP Platform subscription activation key that is automatically installed when the instance is provisioned, secure HTTPS connection to the On Demand Platform and Openbravo instance, openbravo has online system backup,

Technology stack updates Access to the server. ERP deployments now starting to take more hold, Openbravo is quickly gaining international penetration. Openbravo is gearing its open source software mainly too small to medium-sized enterprises and government agencies.

Comparing that we can recognize more functionalities of Openbravo ERP. Include necessary functionality for complex retail management process, Openbravo is open source, it is easy to integrate, it can run any platform, it has details documentation, it has scalability.

2. OBJECTIVES

1.1. Main Objectives

As mentioned above ERP systems are becoming popular in small and medium scale organizations all over the world. Therefore we are decided to localize the world famous openbravo ERP into Sinhala. Since Sinhala is the mother tongue in Sri Lanka. Most of Sinhalese are not expert by using English. Therefore we found an appropriate way to connect with the modern world according to their aptitude and also gain benefits from the latest technology. In our project we are decided to solve that problem and the main objectives of the research project are mentioned as follows.

Objective 1:

Localize the openbravo ERP system into Sinhala

Openbravo is some kind of open source system which can be configured to support international business practices and deployed in most countries. In addition it has specific local adaptations to many languages and regions. Last decade organizations in our country have a considerable usage of many kind of English knowledge, not only but also the most powerful organization can gain the value of that systems. To fulfill this gap we decide to localize the openbravo to Sinhala.

Objective 2:

Implement the localized system to the university system

As university students we know the background and the roles of university. Therefore we decide to implement that system to the university system after the localization approach completed. In a university we have many departments, human resources, services etc. If we implement this ERP system they can gain large scale of advantages. Some of them are operational benefits, managerial benefits likewise.

1.2 Specific Objectives

II. To gain operational benefits

Under the operational benefits we categorized it into separate parts. There are cost reduction, cycle time reduction and quality improvement. Cost of labor cost reduction means minimize the customer service, finance, human resources likewise. Cycle time reduction goes with the customer support activities in order to fulfillment customer requirements. As a university their target customers are students and they should fulfill students' requirements. Also under the quality improvement we are decided to implement how we can minimized the error rate, maximized data reliability and accuracy.

III. To gain managerial benefits

In that objective we mainly focused better resource management. If we have better assets management for improved cost, maintenance records control, inventory managements and other system related activities definitely workflow of organization is much clear and understandable. That can be the one of successful turning point of the organization.

IV. To gain organizational benefits

We think organizational benefits can be evaluated in individual positions of members who are participating for organizational performances. According to the ERP system background we have a proper skeleton and also systematic workflow. Related to above benefit organizational leader can break working algorithm and can identify faulty situations quickly. Therefore he can be changed work pattern and can build a common vision, motivation and employee morale. It can be also huge investment for the organizational future works.

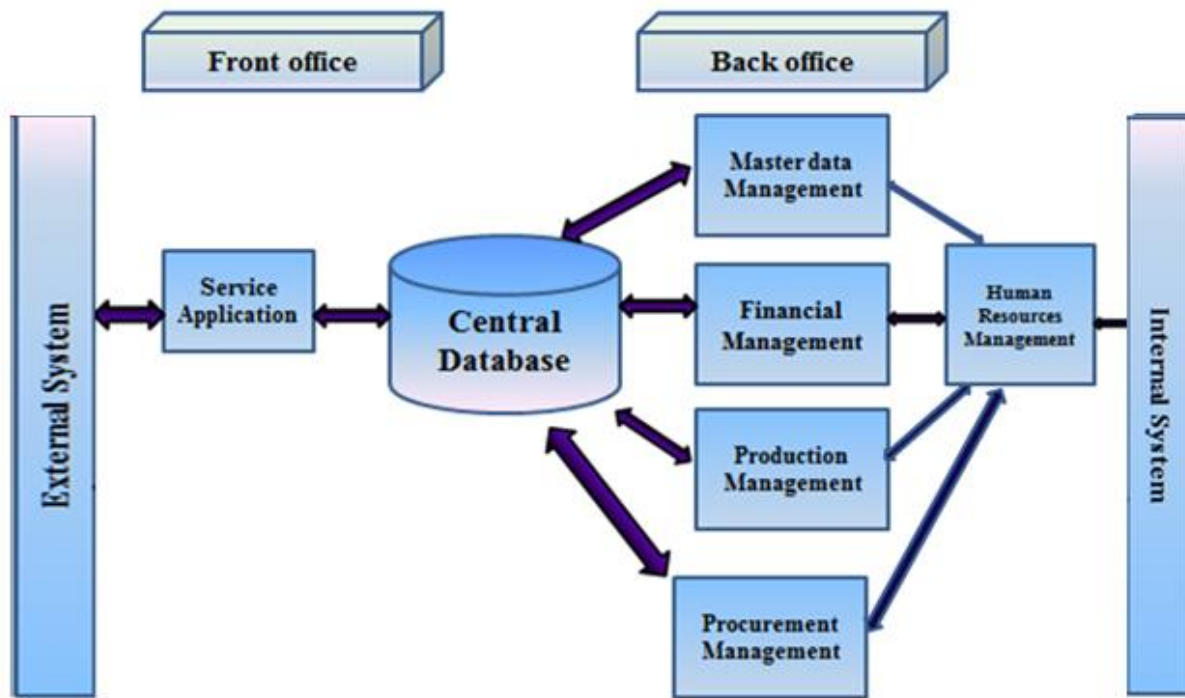
V. To gain intangible benefits

Organizational value is the some kind of balancing point among benefits and cost. Every organization want more benefits with minimize budgeting. Therefore organization should measure both of tangible benefits and intangible benefits. In here intangible benefits are internal improvements, customer service, foresight and adaptability. First we should convert those values into monetary terms and then accordingly that result organization can gain future oriented ideas. In our openbravo system background facilitate us to identify intangible benefits in a proper manner.

3. RESEARCH METHODOLOGY

In modern world ERP act as the backbone of an organization. That means successful implemented ERP system requires a measurable outcome not only that but also it was a kind of investment.

At the core of research implementation central data base is there and functioning ERP will be able to manage and access the data from many departments. It is a kind of workload segmentation.



This diagram represents a kind of skeleton of system research background. Internal system indicates outsource people of our system. According to the university scenario students who engage with courses are the main actors of the internal party.

External system indicates employees who have represent organizational performances. According to our perspective service application and human resource management are the interconnected modules to the central data base. There are four other units separately. Those

individual units work according to separate methodological environments. Finally it will collaborate with central data base.

This kind of model gives many advantages. Some of them are improved data access, less redundancy in data operational tasks, cost reduction etc.

When we are going to localize a new project or existing project we become the localization leader. To lead a community localization project to localize Openbravo ERP for the particular country is the main role of the localization leader. Considerable responsibilities and benefits are there regarding with localization leader. Main responsibilities are act as a hub for coordinating localization effort in working towards the community objectives, actively participate in the forum for your specific community and willing to be seen as the community leader for that country.

Openbravo ERP can be easily localized to any local language. UK, Thailand, Switzerland, Spain, Saudi Arabia likewise there are lot of completed localization projects and many more in progress now at that time. Translation and chart of accounts are the minimum objectives for a community localization project. Translation focus the user interface needs to be translated to the language of the user in the region. It should be at least up to 80% out of whole localization capacity. Chart of accounts is the structure and rule that regarding with govern accounting. It should be happened according to the local practices and regulations. At the same time provide o tighter fit to the local requirements and include additional geography. Specific capabilities by providing additional modules are the activities which may hope by a community localization project.

There are number of modules which are included our localization process. Setup of the local taxes for a specific entity, create dedicated reports to facilitate the filing of official reports, create export files to facilitate the electronic data interchange with official bodies, modify the user interface and add country specific calendars are the included modules. Even though it is easy to localize openbravo ERP system, we can't do that only based on our vision or our desire. Because there are some policies related with localization process. Openbravo ERP must be offered with an open source licensee, openbravo reserves the right to appoint or remove a localization leader.

But it does commit to informing the local community of its actions. Have two main policies out of localization policies. Now when consider about the localization concept, it explains the openbravo localization types as well as who can localize openbravo ERP software. There is wealth of information on how to properly localize openbravo ERP system from the overall step by step localization process in the localization guide. Not only that the localization guide contains the very basic localization tasks. Now here briefly take down openbravo installation procedure. So that we should have several tools like JDK, Ant, Tomcat and PostgreSQL after download and install these tool hit our browser at <http://localhost:8080/openbravo> then give its username and password. Then it will redirect to the welcome page.

Master data management

Openbravo "Master Data Management" helps to organize and centralize in a single repository the key data of the organization.

Having a single repository of data:

1. Avoids data duplication
2. Provides a unique way of data coding
3. And is a key aspect for guaranteeing the coherence and tracking of business processes of any type.

Master data is the core data that is essential to operate in a specific business or business units. Development and execution of architecture, policies, practices and procedure related with information is the data management and this is done for an effective manner.

This is one of the main functions regarding with openbravo ERP system. Openbravo master data management helps to organize and centralize in a single repository the key data of the organization. Mainly we can identify four areas and they are send mail text, business partner setup, product setup, import data, master data creation is one part of the overall business setup flow in openbravo and as any other setup it is required prior entering transactions.

Initially we consider about the business partner setup out of four areas of openbravo master data management. Define the configuration of the business partners are separately allowed by the business partner setup folder. As well as this business partner setup involves the creation of the business partner categories and the establishment of payments terms and discounts.

When do a management of master data in openbravo software, business partners are main characters and they can be grouped into different categories with the target of helping their management and analysis. In master data management there are many of key concepts, they are business partner, business partner category, payment term, payment method, discount, product, product category, product characteristics, unit of measure, Attribute set, prices list version and so on. Out of them business partners can be a customer, a supplier, a creditor or an employee. Business partner is a third part which can be an organization or a person in which a company has a business interest in or a business relationship with and it can have different roles for a company. The same business partner can be a vendor as well as a customer.

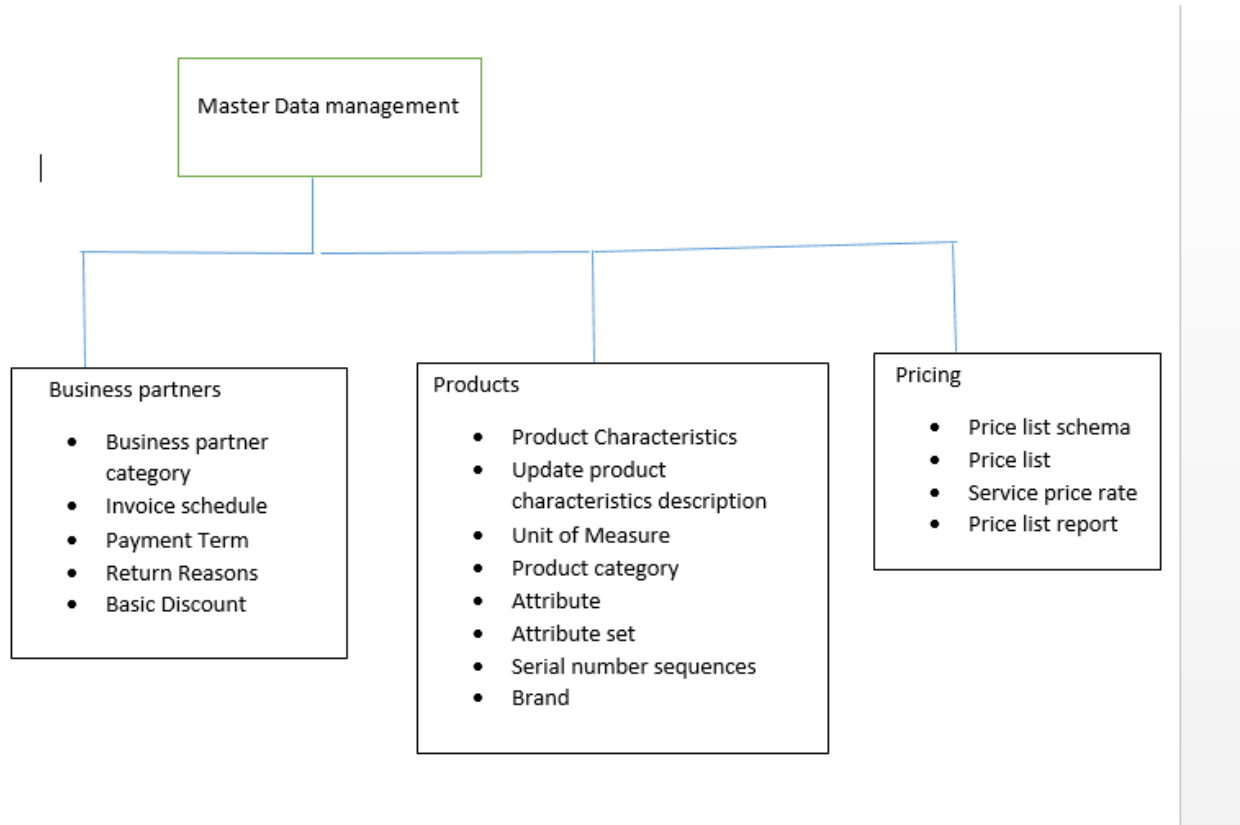
Master Data Management key concepts

The key data of the company which are explained within this section are:

- **Business Partner** - a third party which can be an organization or a person in which a company has a business interest in or a business relationship with. A business partner can be a customer, a supplier, a creditor or an employee. A business partner can have different roles for a company. The same business partner can be a vendor as well as a customer.
- **Business Partner Category** - a group of "Business Partner". Multiple Business Partner Categories can be created, according to the company's needs
- **Payment Term** - period(s) allowed to pay off the amount due. A vendor may demand cash on delivery or a deferred payment period of 30 days or more.
- **Payment Method** - acceptable forms of payment. Vendor may demand to be paid in cash, or by check or promissory note, etc...

- **Discount** - a deduction from the total amount of an invoice. Discounts can also be applied just to a line/few invoice line amounts. Discounts can be made in advanced of its sales or after getting a certain volume of sales.
- **Product** - a good that is either bought or produced or a resource or service that is offered.
- **Product Category** - a group of Products.
- **Product Characteristics** - a way of defining characteristics for a product such as size, color, etc. Per any combination of these characteristics a product can be created based on the definition of its generic product. For example if the generic product has size and color with values S, M, Green and Yellow than 4 products (SKU) will be created
- **Unit of Measure** - a unit of measure is a standard unit or combination of units to be used alongside the quantity of a product. For example liter, unit, kegs, etc.
- **Attribute** - a feature of a product such as color, size, packaging, etc.
- **Attribute Set** -a grouping of features of a product in a set, so that multiple attributes can be used for a product. An attribute set might also be defined to include "Serial Number" and "Lot Number" as an additional product feature. "Lot and Serial Numbers" are key product features used for product tracking purpose.
- **Lot Number** - a unique number given to a particular quantity or lot of a product/item.
- **Serial Number** - a unique number given to each unit of a product/item.
- **Net List Price** - an indication of the price for a product, used to determine the net unit price by applying a discount
- **Net Unit Price** - the price per unit that is used for products on orders and invoices
- **Price List Schema** - a template used to automatically populate a new version of a price list
- **Price List** - a list of products and its prices
- **Price List Version** - different version of a price list are created in order to make a clear distinction in prices based on time line or special event. With the creation of different versions the historic data remain available for previous versions.

Below diagram shows procedure of Master data management



Production Management

In Production Management the process of producing products from raw material is managed. The production process itself, as well as monitoring the quality of produced products, the maintenance of the machine used in production and the cost management for raw material and end products in managed.

Production management is the ability to provide process manufactures with the means to plan and schedule, track analyze, and direct and operate their procedures. It is concerned with making qualities of each product group that need to be produced in each period. It can be broken down into three categories. They are the desired inventory levels, the resources of

equipment, labor and material needed in each period and third one is availability of the resources needed. A sequence of events organizes the manufacturing of one or many products. The same product can be provided using a variety of process plans. According to that each product has one process plan.

When consider about the production management the main documents to manage the production processes are the process plan, the work requirements and the work effort.

At the same time product manufactured, activities involved, tool set involved and product use are the four activities which process plan can be decomposed.

In configuration of production management, although setup screens in the production module, more additional setups are required. For production management, there are different products that are set up. They are raw material used in production, finished products produced in production. Apart from those two, based on cost calculations a theoretical standard cost can be determined for the end product and a safety stock level is determined are entered for the product, are the things that should be set up.

Maintain about the raw material used in production, the production checkbox is selected to indicate that the product is used for production. As well as the process plan of production management is selected and also business partners are configured for production.

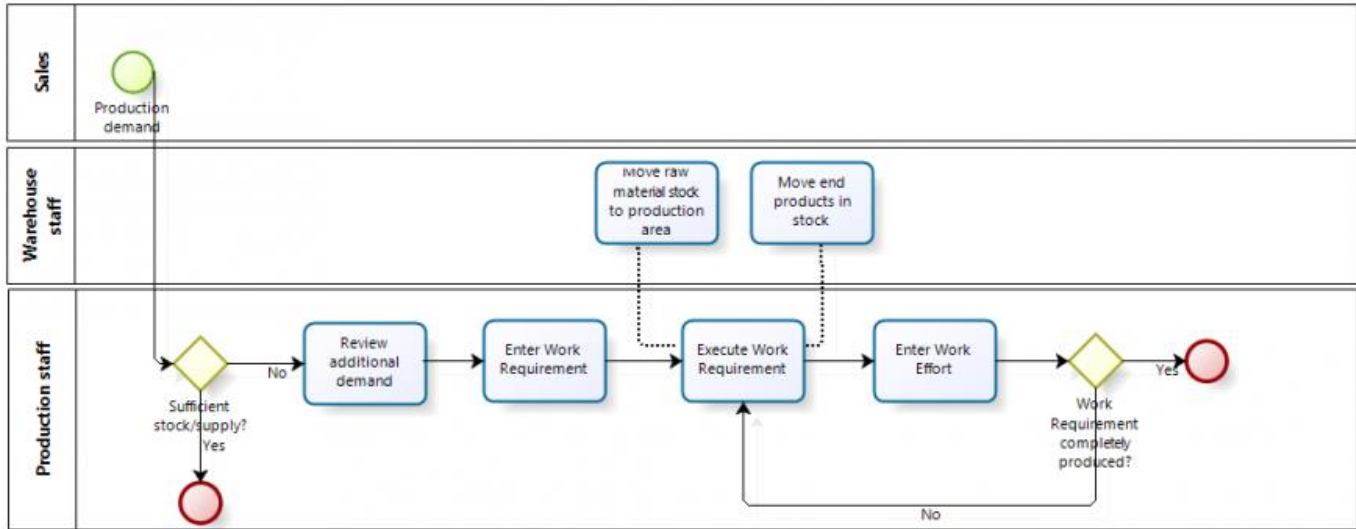
In execution of production management sales staffs enter sales order for the product with the quality required and the date by when it needs to be delivered. If the product is not in stock, it needs to be produced. And also if the stock level is below the safety stock level, product have to be produced. Automatically in material requirements planning (MRP) and manually by the production manager are the two ways of the information about the demand from sales orders and safety stock is handled. According to those two ways, ideally the information is handling by MRP. If not, a production manager reviews if production of the product is required by reviewing the total demand of the outstanding sales orders and the safety stock level. And also compare it with the total supply of the stock level and scheduled work requirements.

The staff responsible for executing the production can see on the production run status report what production has to be executed. At the end of each shift, the production managers enter the information of what is produced in the production run screen. Finance staff can calculate

the actual cost of the production for the product. If when do the production management it directly interact with the procurement management, sales management , warehouse management, material requirement planning (MRP) management and finally interact with the financial management.

The main documents to manage the production process are:

- the Process Plan
- the Work Requirement
- the Work Effort



Financial Management

Openbravo automatically generates an accounting representation of all the transactions within the enterprise that have an economic relevance. Accounting is the system of tracking the assets, the debts, the income and the expenses of a business.

In Openbravo, most of the accounting entries are automatically created while posting documents such as:

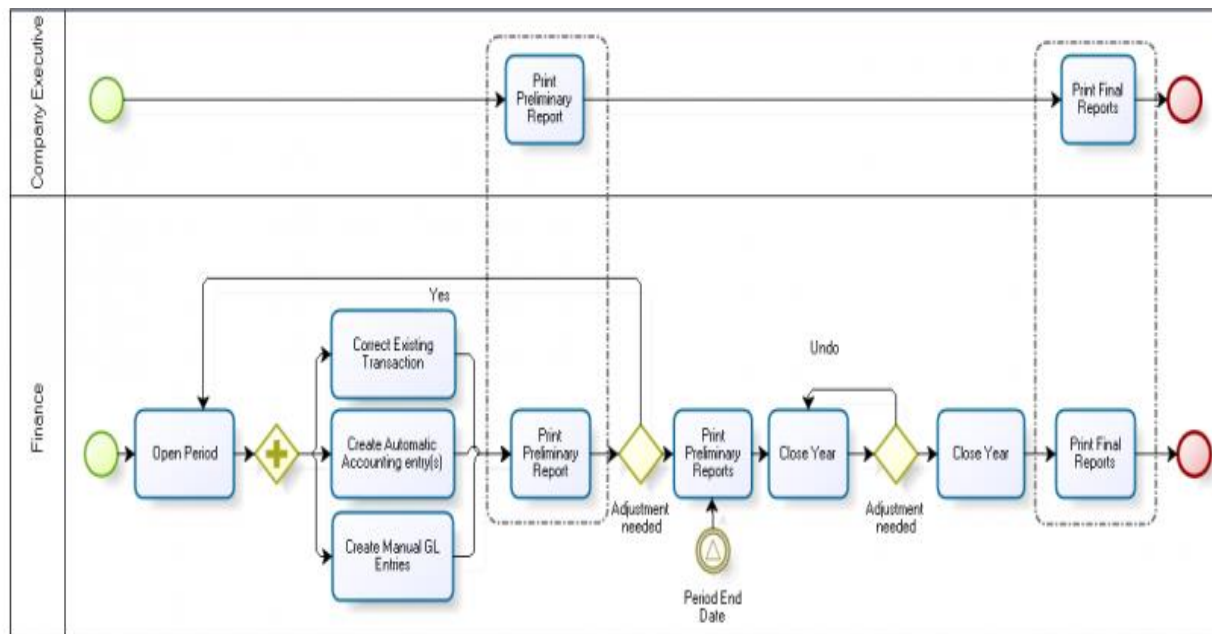
- Goods Receipts
- Purchase Invoices in the Procurement Management business area
- Goods Shipments
- Sales Invoices in the Sales Management business area.

In the openbravo system automatically generates accounting transactions that have economic value. Accounting is the methods that calculate the assets, debts, the income and expenses.

In openbravo the most accounting entries are automatically create when building Purchase Invoice and Good Receipt. In the business area and building Goods Shipments and Sales Invoice in the Sales Management Business area. Accounting entries are directly written in the general ledger therefor accounting entries are do not directly related to the document.

Mainly there are three way to create account. The first one is manually post each documents by using a button. The second one is manually post all the documents /transaction related to the database table for instance the table invoice by using process generally ledger posting by the database table and this one is Automatically post accounting transaction of any type by scheduling the account sever process in the process request window. There are so many accounting actives such as creating and opening of the account period, entering and posting account transaction, manage all credit and debit accounts as well as discretion about all the assets ,reviewing and submitting financial report and tax report to the official authorities and finally close the accounting year. These are performed within the financial management area. Openbravo has an integrated accounting system it have been combine general account and analytical account. Mainly there are three type of openbravo accounting concepts first one is Fiscal Calendar the second one is Account tree and the other one is general ledger configuration. In the fiscal calendar all the financial transactions are record in the ledger.

In the account tree accounts such as balance sheet like list of accounts used in an organization general ledger. In the general ledger configuration it is use capture all accounting rules such as currency and chart of accounts among others. Period End Close to Financial Report business flow manages the open and close of periods.



Openbravo has an integrated accounting system that combines general accounting and analytical accounting:

- General accounting aims to primary exploit dimensions such as "Account" (or "Subaccount" in Openbravo terms)
- Analytical accounting aims to exploit other dimensions such as "Cost Center" or "Campaign" to get a slightly different but also rich financial information.

Procurement Management

When we consider about it deals with all the activities related to the purchase of goods services from external suppliers and the corresponding reporting. In openbravo, procurement management area covers Requisition to receipt and invoicing parts of procure to pay business flow and supplier returns business process. Procure to pay business flow is the workflow manages the life-cycle of a procurement process. It has difference functionalities and we can divided in to two sub-processes. They are requisition to receipt and supplier invoice to payment. Requisition to receipt is the process starts by the creation and management of purchase requisition and corresponding purchase order to the moment the warehouse staff receives the merchandise. And supplier invoice to payment is continue previous sub-process by registering the supplier invoice and closes it by paying supplier invoices.

In configuration of Procurement Management some kind of set up needs to be done before performing the process. They are products, costing rules, landed cost types, business partners and price configuration. Here product can be divided into two category called vendors and suppliers. In product, it needs to be configures prior any purchase requisition is issued. Each and every product that is being purchased needs to have a price in the purchase price list in order to be selectable in any transactional document like a purchase order or a purchase invoice. The input of an input transaction such as a good receipt can be calculated by using the purchase price excluding taxes. Besides that, the cost of the product included in a good receipt can be adjusted as a result of allocating different type of landed costs in the receipt. Business partners in Procurement Management, need to be configured prior any purchase requisition can automatically turns into a purchase order. Procurement Management application area if you are going to explore it based on samples client shipped with Openbravo by default. The sample data set already contain the roles, business partners, product, warehouse, and price pre-configured.

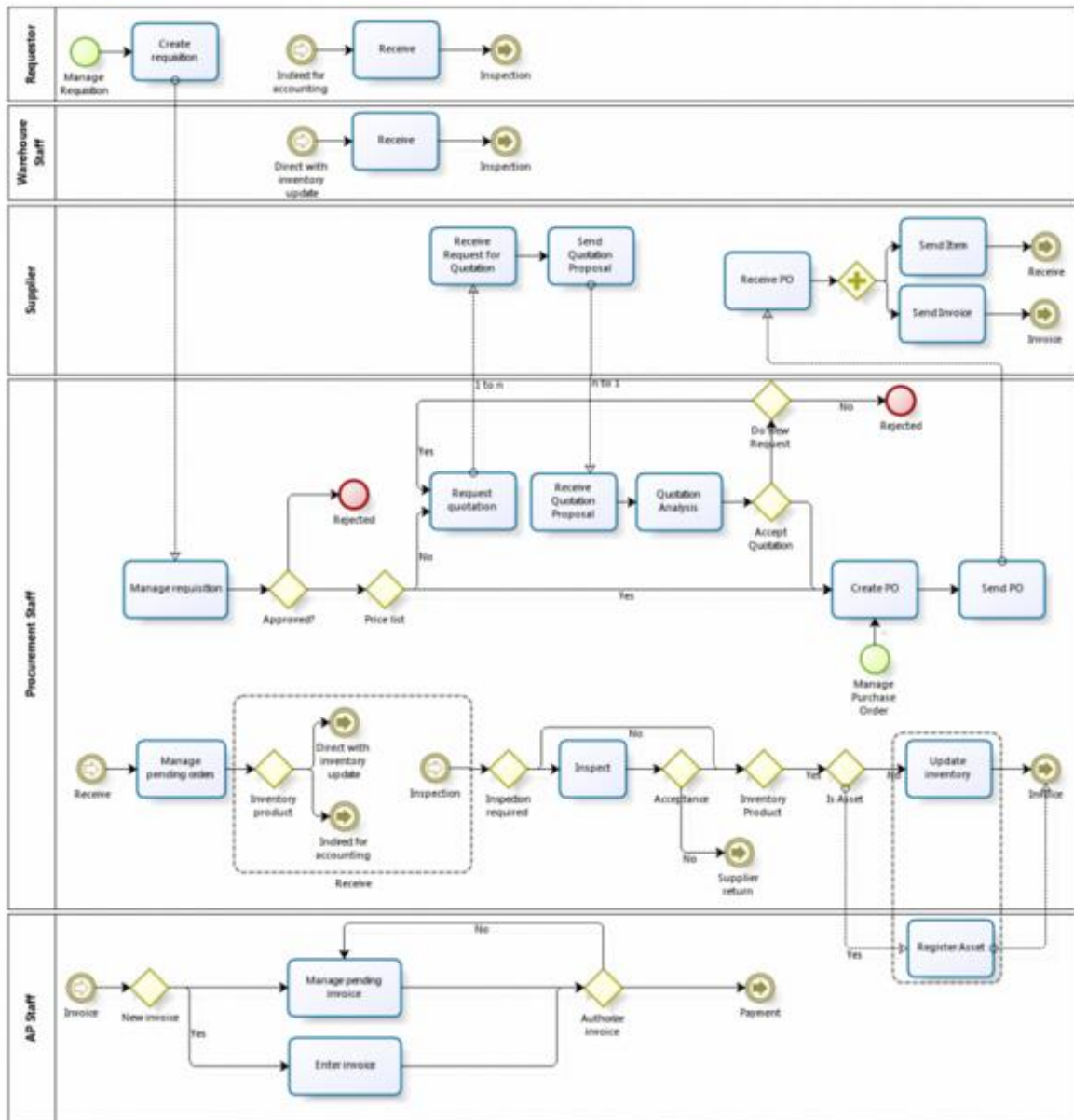
In execution Procurement Management procure to pay business process is executed. Any one of the organization allowed to do so can directly issue a requisition as a result of an organization or business unit need. Requisitions notify the purchase staff of products to order, their quantity and the time frame for its delivery. Purchase staff is then in charge of managing already created purchase requisitions or even create new ones if required.

Procure to Pay workflow manages the life-cycle of a procurement process.

Due to its complexity and different roles involved it is convenient to split Procure to Pay down into two main sub-processes:

1. **Requisition to Receipt** process starts by the creation and management of purchase requisitions and corresponding purchase orders to the moment the warehouse staff receives the merchandise.

2. **Supplier Invoice to Payment** continues previous sub-process by registering the supplier invoices and closes it by paying supplier invoices.



4. DESCRIPTION OF PERSONAL AND FACILITIES

Member	Component	Task
Ekanayaka W.K.S.P	Master data management	<ul style="list-style-type: none"> • Handling details of business partners • Handling Product details • Handling pricing details • Localization all master data
Gamage Y.M.K	Financial management	<ul style="list-style-type: none"> • Creating and opening of the accounting periods • Entering and posting accounting transactions • Managing payables and receivables accounts as well as the assets description • Localization all financial details
Chathurangi K.P.B.B	Production management	<ul style="list-style-type: none"> • Handling process plan • Handling work requirement • Localization production details
Chathurangani Y.M.A	Procurement management	<ul style="list-style-type: none"> • Handling all the activates related to the purchase of goods and services • Localization procurement details

5. BUDGET

6. REFERENCES

- [1] U. Ada Wong The University of Hong Kong The University of Warwick, "Critical Failure Factors in ERP Implementation," 2003.
- [2] T. Alok Mishra Atilim University, "Achieving Business Benefits from ERP Systems," 2016.
- [3] Openbravo. [Online]. Available: http://wiki.openbravo.com/wiki/Openbravo_On_Demand_FAQ.
- [4] Oppenbravo. [Online]. Available: http://wiki.openbravo.com/wiki/Production_Management.
- [5] Openbravo. [Online]. Available: <http://wiki.openbravo.com/wiki/Product>.
- [6] [Online]. Available: http://wiki.openbravo.com/wiki/Procurement_Management.
- [7] [Online]. Available:
http://wiki.openbravo.com/wiki/ERP_2.50:Functional_Documentation/Procurement_Management.
- [8] F. I. LIngaya's University, "International Journal of Advanced Research in Computer Science and Software Engineering," 2013.

7. APPENDICES