

ACHIEVING OPERATIONAL EXCELLENCE & CUSTOMER INTIMACY:

ENTERPRISE APPLICATIONS

ເພົ່າງຈະຕັບຄິດ

(1)

Outline



Enterprise System



Enterprise systems or Enterprise resource planning system (ERP)

Enterprise Systems (from Chapter 2)

Systems for linking the enterprise

ນາມສັກ ແລະ ນາມປາ

- ครอบคลุมการทำงานฝ่ายต่างๆ (Span functional areas)
- ใช้ดำเนินการกระบวนการทางธุรกิจต่างๆ ทั่วทั้งบริษัท (Execute business processes across firm)
- รวมการจัดการทุกระดับ (Include all levels of management)

Four major applications:

- Enterprise resource planning system (ERP)
- Supply chain management systems (SCM)
- Customer relationship management systems (CRM)
- Knowledge management systems (KMS)

ກ່ຽວຂ້ອງຕົວການໃນ
ລັດທະບຽນ ສູງກົດໆ ດ້ວຍໄວ້ເກີ່ມ
ໃຫ້ການຫຼັກ ດາວໂຫຼວດ

Enterprise Application Architecture

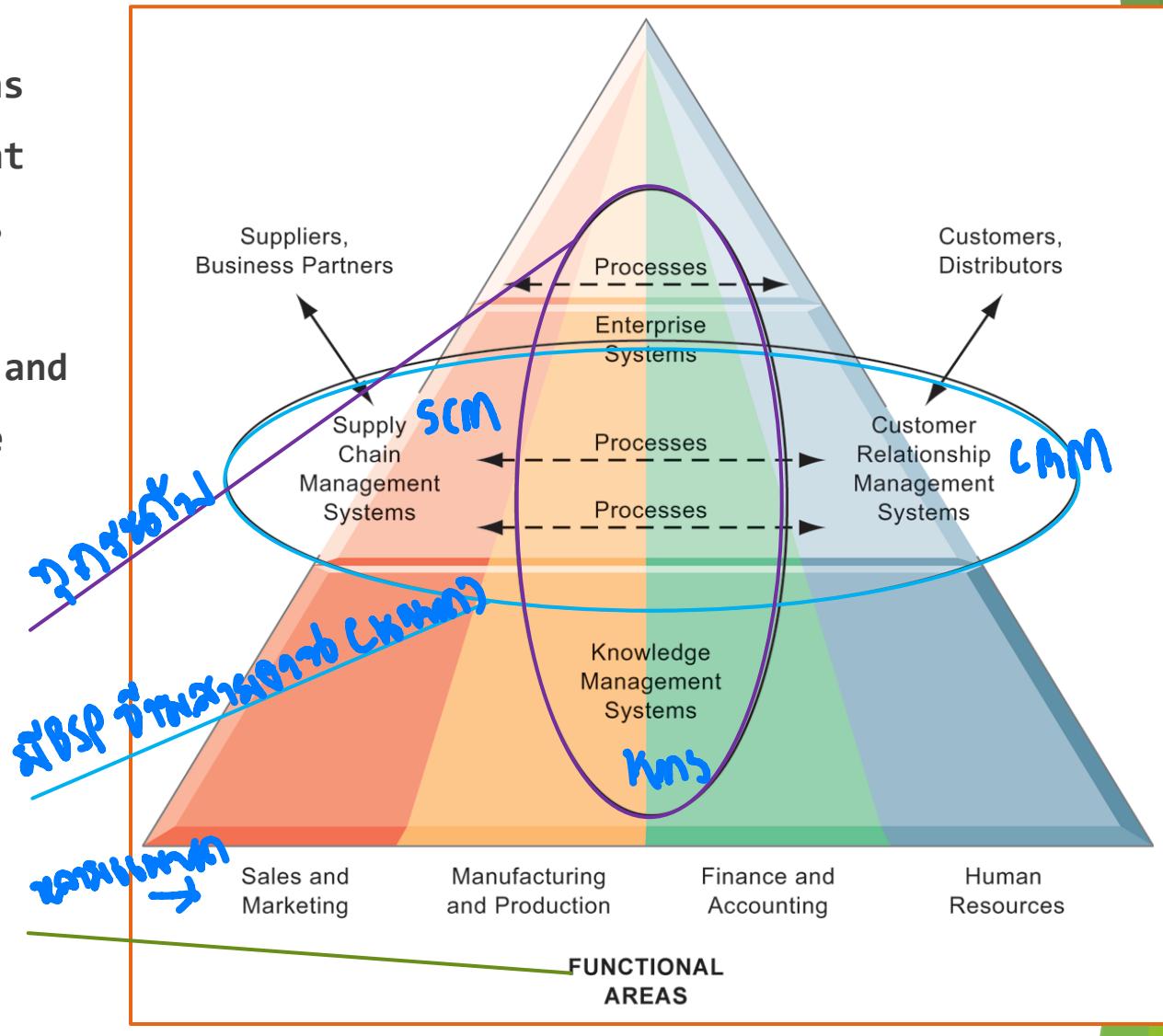
(from Chapter 2)

Enterprise applications automate processes that span multiple business functions and organizational levels and may extend outside the organization.

3) Include all levels of management

2) Execute business processes across firm

1) Span functional areas

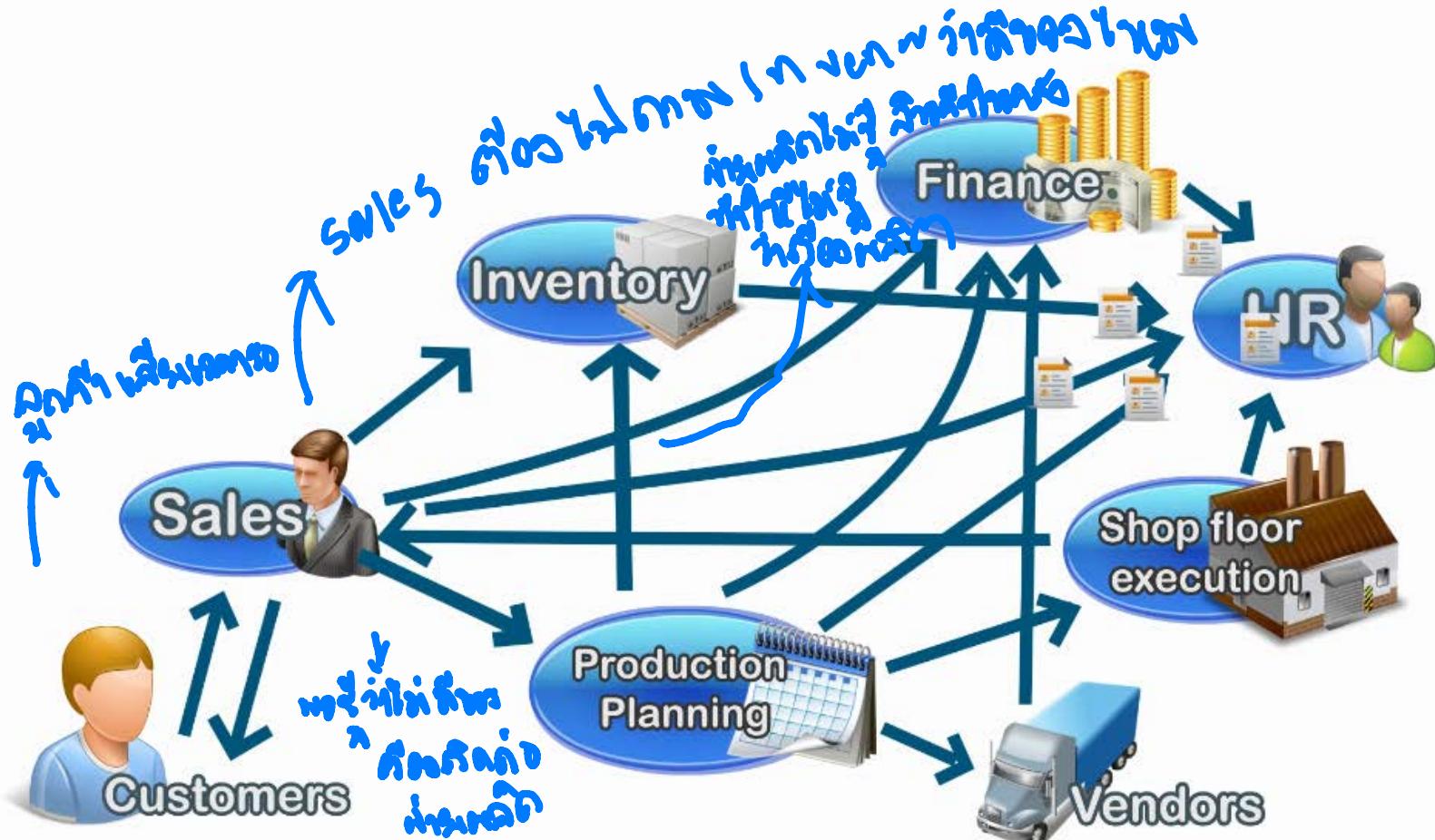


Enterprise Resource Planning System: ERP

(ระบบบริหารทรัพยากรองค์กร)

กระบวนการทางธุรกิจโดยทั่วไป

This is typical business process of manufacturing company



- จึงต้อง ไก่เด็ก ศูนย์กลาง สำหรับ งาน ศึกษาศาสตร์
ชีวภาพ ธรรมชาติ

Enterprise Resource Planning System:ERP

(ระบบบริหารทรัพยากรองค์กร)

↪ ระบบ ที่ 統合 ทุก ภาค กิจ ของ องค์กร
↪ ที่ กลาง ทุก ภาค กิจ



Suite of integrated software modules and a common central database
↪ คลังข้อมูลแบบกลางๆ

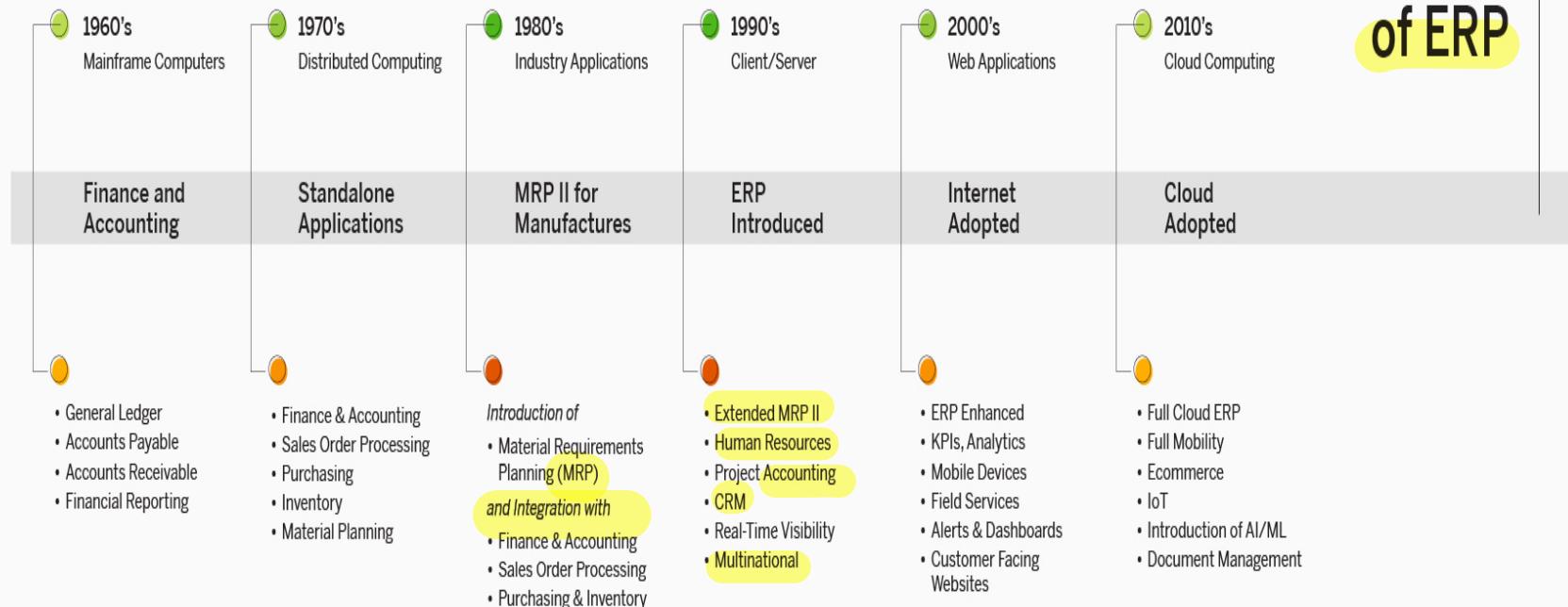


Collects data from many divisions of firm for use in nearly all of firm's internal business activities



↪ ข้อมูล ที่ ร่วมกัน ที่ องค์กร สามารถ ใช้ ในการ ตัดสินใจ
Information entered in one process is immediately available for other processes

The History of ERP



90 ឥឡូវ ERP
2000 ជាន់ net កំណើន នានាដីន និងសំរាប់ net , 2010 ឥឡូវ cloud
មានអិរិយាល័យ cloud

accounts payable = អាជីវកម្ម

ផែនការ credit
នៃសម្រាប់គ្រប់គ្រង
ដើម្បីរាយការអាជីវកម្ម

HOW ERP SYSTEMS WORK?

នំពោះ ឯកសារព័ត៌មាន

ERP គ្រប់គ្រងទូទៅទិន្នន័យ

ទូទៅទិន្នន័យ និង

ទូទៅទិន្នន័យ និង

ក្រប់ក្រង់ទាំងអស់ និងក្រប់ក្រង់ទាំងអស់

និងក្រប់ក្រង់ទាំងអស់ និងក្រប់ក្រង់ទាំងអស់

ដើម្បីបង្កើតរួមគ្នា

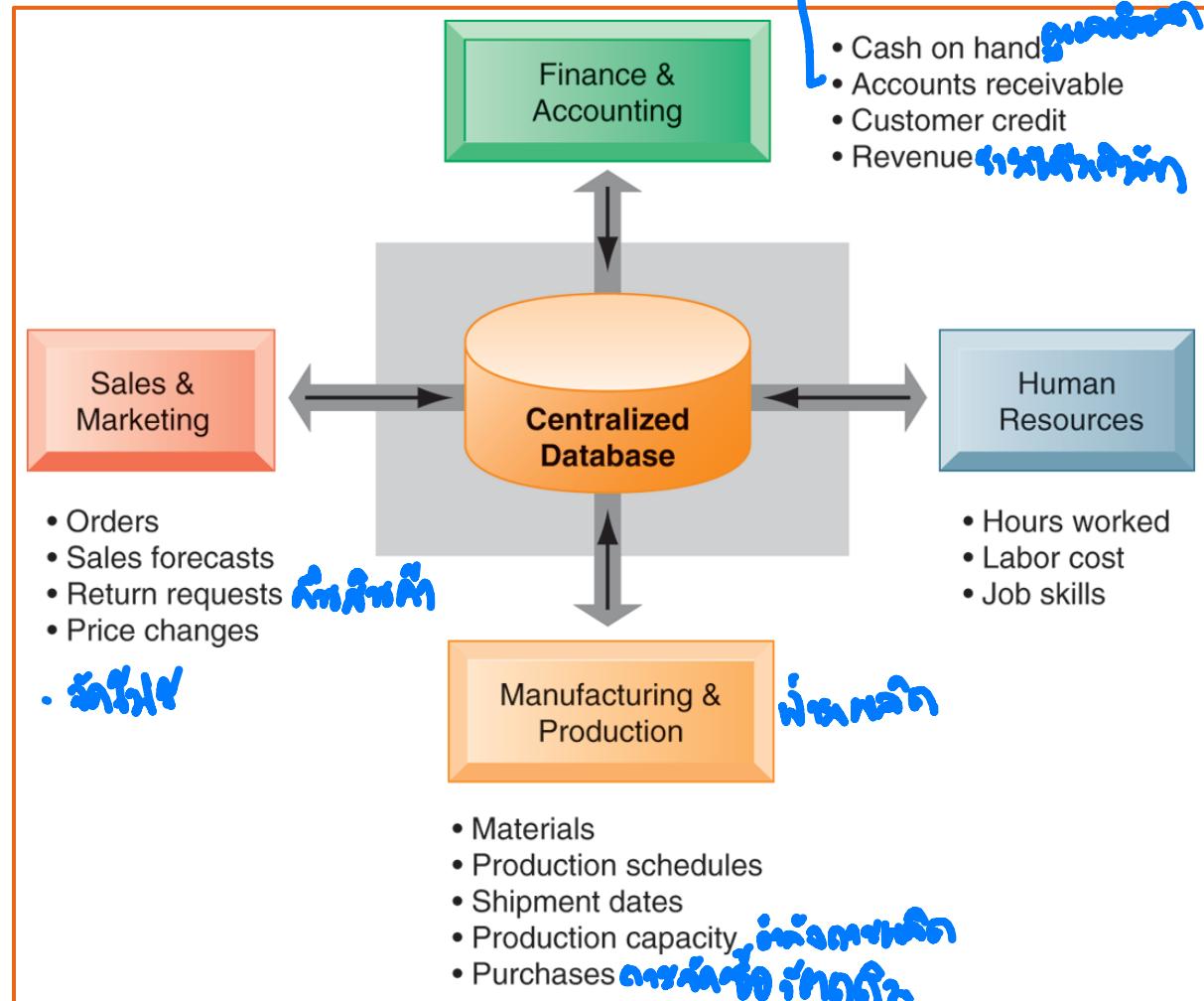
នឹងនិងក្រប់ក្រង់ទាំងអស់

នឹងនិងក្រប់ក្រង់ទាំងអស់

"នឹងនិងក្រប់ក្រង់ទាំងអស់"

នឹងនិងក្រប់ក្រង់ទាំងអស់

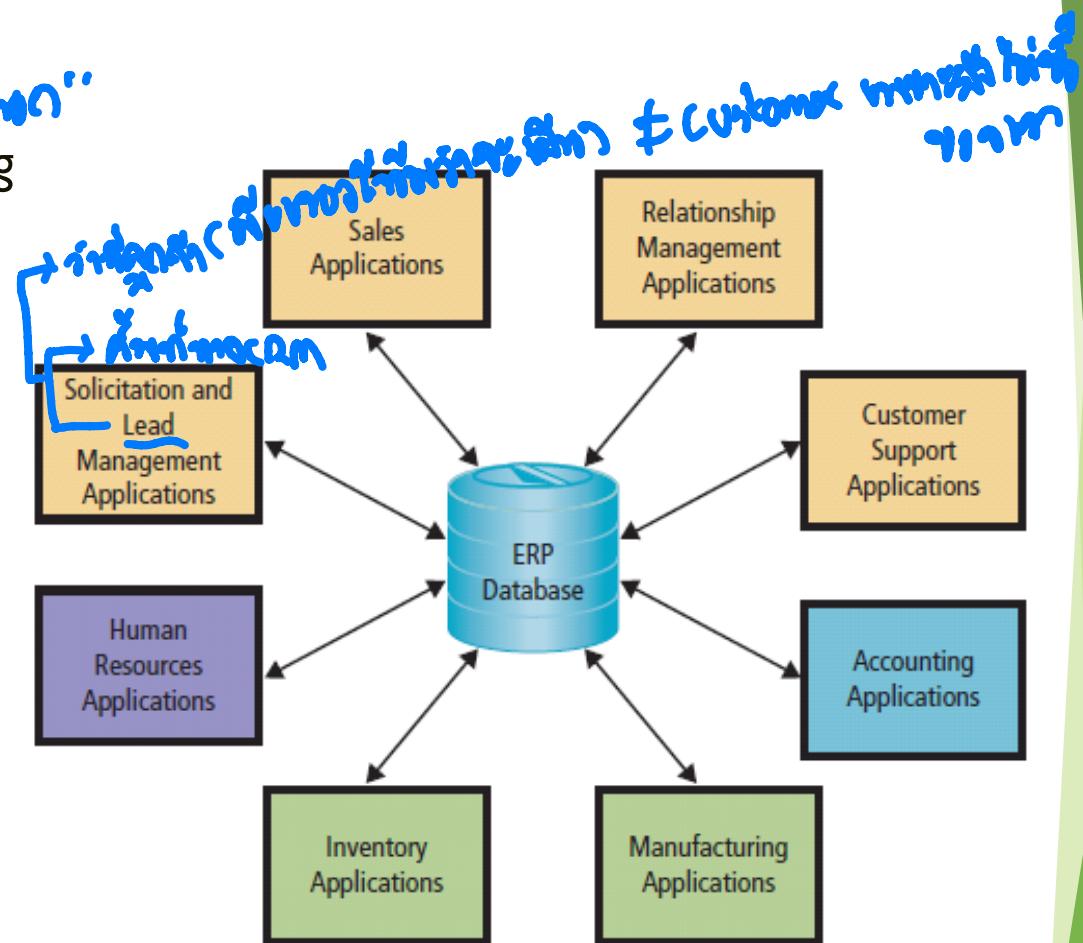
នឹងនិងក្រប់ក្រង់ទាំងអស់



The purpose of ERP systems

Primary purpose

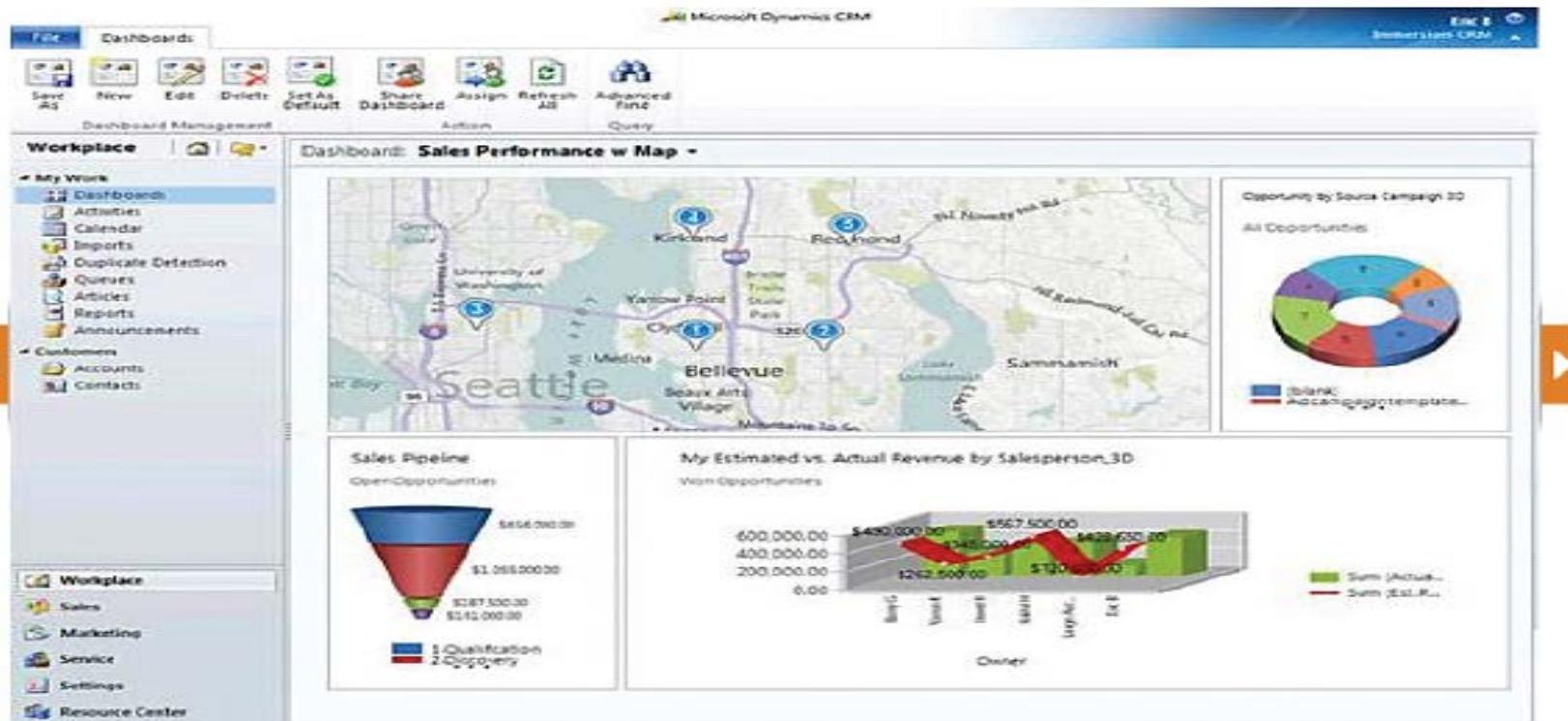
- ▶ Integration of purchasing, human resources, production, sales, and accounting **data into a single system**
- ▶ Allow **real time global updates** of transactions
- ▶ Enable critical **business decisions** using latest data



ERP Enabled Sales Dashboard

what dashboard?

- With integration, ERP systems can display current status of critical business factors to managers and executives.



SOURCE: Courtesy of Microsoft

The Elements of an ERP solution

ERP solution is an information system and has 5 components.

1. Hardware

ឧបករណ៍សេវាទិន្នន័យ

- ▶ Cloud-based hosting
- ▶ Self-managed servers

2. Software: ERP Application programs

3. Data: ERP Databases

4. Procedures: ERP Business process procedures

របៀបការងារ

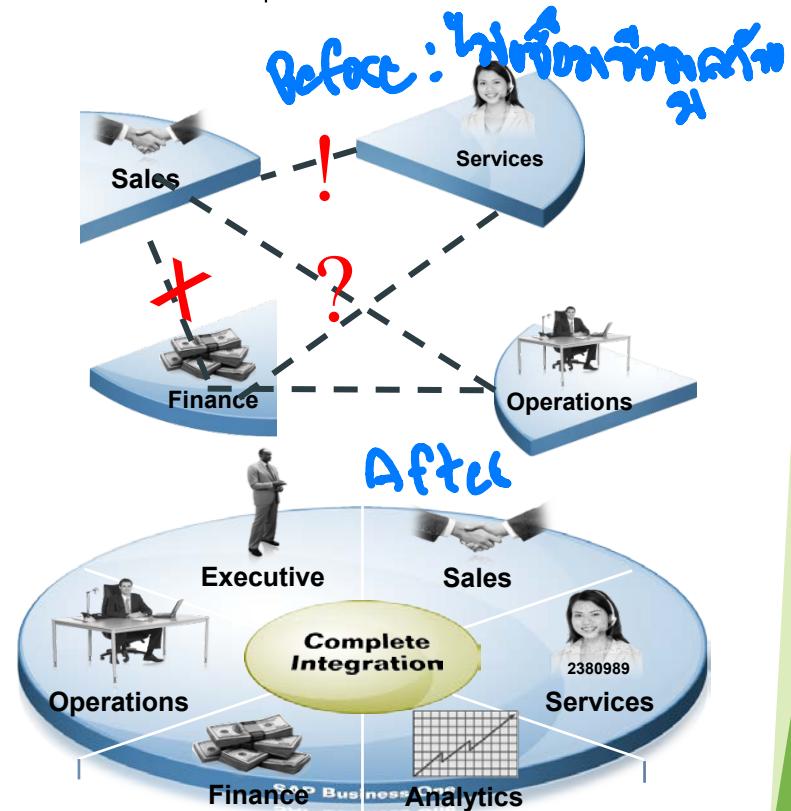
5. People: The people involved in ERP systems, ERP Training and Consulting

ERP Software

- ▶ ERP vendors design application programs to be configurable so that development teams can alter them to meet customer requirements without changing program code.
- ▶ สร้างขึ้นด้วยกระบวนการทางธุรกิจที่กำหนดไว้ล่วงหน้าหลายกระบวนการที่ สะท้อนให้เห็นถึงแนวทางปฏิบัติงานที่ดีที่สุด
 - ▶ Finance/accounting: General ledger, accounts payable, account Receivable, Fixed assets, cash management and forecast, Financial reporting etc.
 - ▶ Human resources: Personnel administration, payroll, benefit accounting, workforce planning etc.
 - ▶ Manufacturing/production: inventory management, purchasing, shipping, production planning, quality control, plant and equipment maintenance etc.
 - ▶ Sales/marketing: Order processing, sales planning, pricing, credit checking, commission management etc.
- ▶ To implement, firms:
 - ▶ เลือกฟังก์ชันของระบบที่พวกรเข้าต้องการที่จะใช้
 - ▶ จับคู่กระบวนการทางธุรกิจกับกระบวนการทำงานของซอฟแวร์
 - ▶ ใช้ตารางการกำหนดค่า (configuration tables) ของซอฟต์แวร์สำหรับปรับให้ตรงตามความต้องการของผู้ใช้

Example of ERP Software: SAP Business One

- SAP Business One ซอฟต์แวร์ที่ถูกออกแบบมาเป็นพิเศษเพื่อตอบสนองความต้องการและความท้าทายของธุรกิจขนาดกลางและขนาดเล็กในปัจจุบัน
- SAP Business One จัดปัญหาที่เกี่ยวข้องกับการมีกระบวนการทางธุรกิจหรือระบบที่ไม่เชื่อมต่อกัน
 - การรวมและเพิ่มความคล่องตัวในทุกพื้นที่การทำงานทั้งการขาย, การตลาด, ลูกค้า, การเงิน และการดำเนินงานทั้งหมดในระบบเดียว เพื่อให้ธุรกิจดำเนินงานเสมื่อนระบบเดียวที่ไร้รอยต่อ
 - มีการเก็บข้อมูลทางธุรกิจที่สำคัญทั้งหมดในฐานข้อมูลเดียว เพื่อให้สามารถเข้าถึงได้ทันที โดยไม่ต้องรับข้อมูลจากระบบอื่นๆ ที่ต่างกัน



Example: Functions in SAP Business One

Sala Daeng Co.,Ltd.
manager

Modules Drag & Relate My Menu

Administration
Financials
Sales Opportunities
Sales - A/R
Purchasing - A/P
Business Partners
Banking
Inventory
Production
MRP
Service
Human Resources
Reports

File Edit View Data Goto Modules Tools Window Help

Confirmation of Recurring Transactions

The transactions below are scheduled for today.
Select the rows you want to execute.

Confirmation of Recurring Postings

The postings listed below should be executed today
Deselect rows you do not want to execute

The date of the recurring postings transaction will be:

Current System Date
 Recurring Postings Date

#	Posting No.	Description	Date	Value	Instance
8	Rent	ค่าเช่า	23.10.14	THB 107,000.00	8
9	Rent	ค่าเช่า	23.10.14	THB 107,000.00	7
10	Rent	ค่าเช่า	23.10.14	THB 107,000.00	6
11	Rent	ค่าเช่า	23.10.14	THB 107,000.00	5
12	Rent	ค่าเช่า	23.10.14	THB 107,000.00	4
13	Rent	ค่าเช่า	23.10.14	THB 107,000.00	3
14	Rent	ค่าเช่า	23.10.14	THB 107,000.00	2
	Total			THB 1,286,889.00	

Number of Postings to be Executed 15

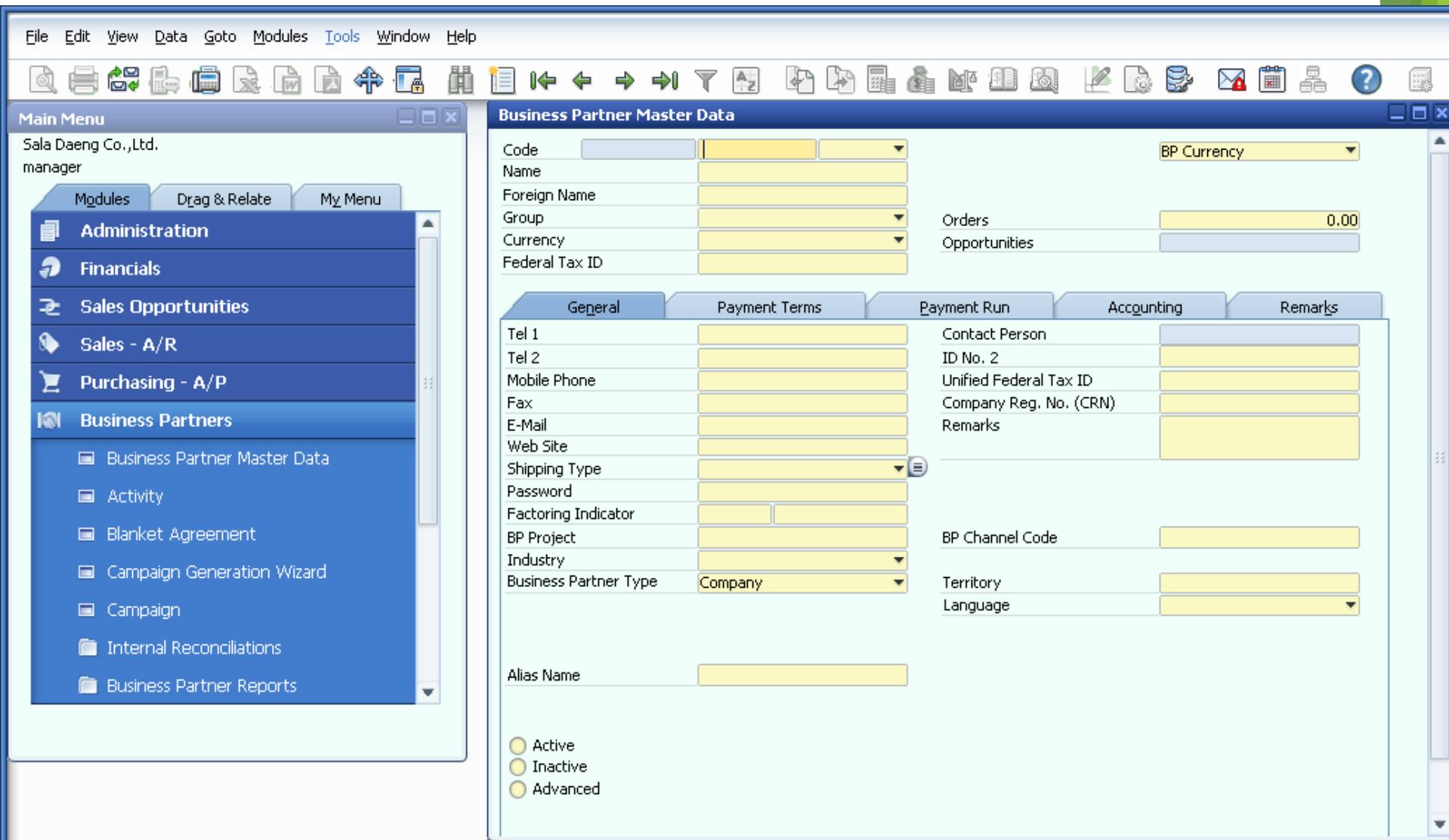
Execute Cancel Remove

To Next Transaction Request User Confirmation

23.10.14 14:34

SAP Business One

Example: Business Partners Master Data



The screenshot shows the SAP Business Partner Master Data interface. The top navigation bar includes File, Edit, View, Data, Goto, Modules, Tools, Window, and Help. Below the menu is a toolbar with various icons for search, print, and document management. The main menu displays the user's name (Sala Daeng Co.,Ltd. manager) and a list of modules: Administration, Financials, Sales Opportunities, Sales - A/R, Purchasing - A/P, Business Partners (selected), Business Partner Master Data, Activity, Blanket Agreement, Campaign Generation Wizard, Campaign, Internal Reconciliations, and Business Partner Reports.

The central area is titled "Business Partner Master Data". It contains several input fields for basic partner information: Code, Name, Foreign Name, Group, Currency, and Federal Tax ID. To the right of these are dropdown menus for BP Currency (selected) and Orders (0.00). Below this is a grid of tabs: General, Payment Terms, Payment Run, Accounting, and Remarks. The General tab is active, showing fields for Tel 1, Tel 2, Mobile Phone, Fax, E-Mail, Web Site, Shipping Type (with a dropdown arrow), Password, Factoring Indicator, BP Project, Industry (with a dropdown arrow), and Business Partner Type (set to Company). To the right of the grid are fields for Contact Person, ID No. 2, Unified Federal Tax ID, Company Reg. No. (CRN), and Remarks. At the bottom left is an Alias Name field, and at the bottom right are status indicators for Active, Inactive, and Advanced.

Example: Purchase Request (ใบเสนอขอซื้อ)

File Edit View Data Go To Modules Tools Window Help

Main Menu
OEC-601

Modules Drag & Relate My Menu

Purchasing - A/P

- Purchase Blanket Agreement
- Purchase Request
- Purchase Quotation
- Purchase Order
- Goods Receipt PO
- Goods Return
- A/P Down Payment Request
- A/P Down Payment Invoice
- A/P Invoice
- A/P Credit Memo
- A/P Reserve Invoice
- Recurring Transactions
- Recurring Transaction Templates
- Landed Costs
- Procurement Confirmation Wizard

Purchase Request

Requester	User	it601	No.	Primary	1
Requester Name			Status	Open	
Branch	Main		Posting Date	23.10.17	
Department	General		Valid Until	23.11.17	
<input checked="" type="checkbox"/> Send E-Mail if PO or GRPO is Added			Document Date	23.10.17	
E-Mail Address			Required Date	23.10.17	

Contents Attachments

#	Item No.	Vendor	Required Date	Required Qty.	Info Price	Disc...	T...
1	A00001	V10000	23.10.17	1	GBP 200.00	0.00	I1
2						0.00	I1

Owner Total Before Discount GBP 200.00

Freight Total Payment Due GBP 235.00

Tax GBP 35.00

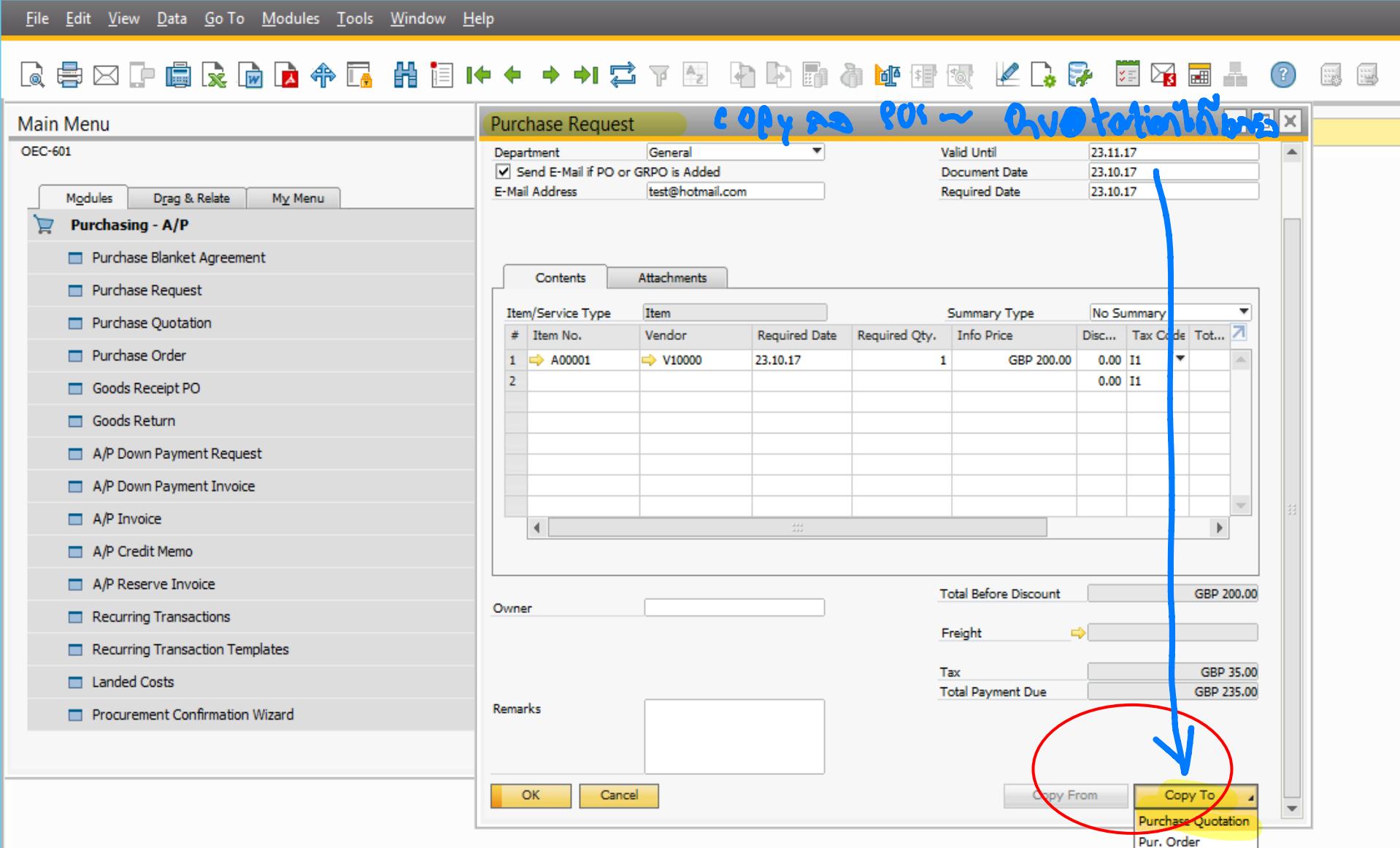
Remarks

OK Cancel Copy From Copy To

23.10.17 13:36

SAP Business One

Example: Purchase Request → Purchase Quotation



Example: Purchase Quotation

File Edit View Data Go To Modules Tools Window Help

Main Menu
OEC-601

Modules Drag & Relate My Menu

Purchasing - A/P

- Purchase Blanket Agreement
- Purchase Request
- Purchase Quotation
- Purchase Order
- Goods Receipt PO
- Goods Return
- A/P Down Payment Request
- A/P Down Payment Invoice
- A/P Invoice
- A/P Credit Memo
- A/P Reserve Invoice
- Recurring Transactions
- Recurring Transaction Templates
- Landed Costs
- Procurement Confirmation Wizard

Purchase Quotation

Vendor	V10000	No.	Primary	1
Name	Acme Associates	Status	Open	
Contact Person	Sarah Kierl	Posting Date	23.10.17	
Vendor Ref. No.		Valid Until	23.11.17	
BP Currency	GBP	Document Date	23.10.17	
Group No.		Required Date	23.10.17	

Contents Logistics Accounting Attachments

Item/Service Type	Item	Summary Type	No Summary			
#	Item No.	Required Date	Quoted Date	Required Qty.	Quoted Qty.	Unit Price
1	A00001	23.10.17		1		
2						

Buyer James Chan (Buyer)
Owner

Total Before Discount
Discount %
Freight
 Rounding GBP 0.00
Tax
Total Payment Due GBP 0.00

Remarks Based On Purchase Request 1.

Add Cancel Copy From Copy To

23.10.17 13:37

Copy To

Example: Purchase Quotation → Purchase Order

Purchase Quotation

Vendor	V10000	No.	Primary	1
Name	Acme Associates	Status	Open	
Contact Person	Sarah Kierl	Posting Date	23.10.17	
Vendor Ref. No.		Valid Until	23.11.17	
Local Currency		Document Date	23.10.17	
Group No.	Primary	Required Date	23.10.17	

Contents **Logistics** **Accounting** **Attachments**

Item/Service Type		Item	Summary Type			No Summary
#	Item No.	Required Date	Quoted Date	Required Qty.	Quoted Qty.	Unit Price
1	A00001	23.10.17		1		
2						

Buyer: James Chan (Buyer) Owner:

Total Before Discount: Discount: % Freight: Rounding

Tax: Total Payment Due: GBP 0.00

Remarks: Based On Purchase Request 1.

OK Cancel Copy From Copy To

23.10.17 13:40

Purchase Order

Vendor	V10000	No.	Primary	418	- 0
Name	Acme Associates	Status	Open		
Contact Person	Sarah Kierl	Posting Date	23.10.17		
Vendor Ref. No.		Delivery Date	23.10.17		
Local Currency		Document Date	23.10.17		

Contents **Logistics** **Accounting** **Attachments**

Item/Service Type		Item	Summary Type			No Summary
#	Item No.	Quantity	Unit Price	Disc...	Tax Code	Total (LC)
1	A00001			I1		
2				0.00	I1	

Buyer: James Chan (Buyer) Owner:

Total Before Discount: Discount: % Freight: Rounding

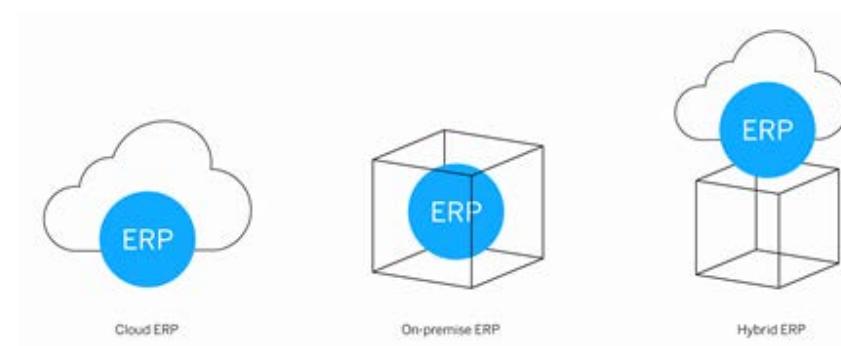
Tax: Total Payment Due: GBP 0.00

Remarks: Based On Purchase Request 1.
Based On Purchase Quotation 1.

Add Cancel Copy From Copy To

Types of ERP deployment

- ▶ Cloud ERP
 - ▶ In cloud ERP, the software runs on a provider's cloud computing platform. The maintenance of the system is handled by the provider. There is also a choice of utilizing a public or private cloud, which is gaining acceptance because of the low upfront costs.
- ▶ On-Premise ERP **កម្រស់ផ្ទាល់ខ្លួន**
 - ▶ This is the traditional model for deploying software where you control everything. The ERP software is installed in your data center at the locations of your choice. The installation and maintenance of the hardware and software is your staff's responsibility.
- ▶ Hybrid ERP **បច្ចេកទេស កម្រស់ផ្ទាល់ខ្លួន និង កម្រស់ផ្ទាល់ខ្លួន**
 - ▶ For companies that want a mixture of both to meet their business requirements, there is the hybrid cloud ERP model. This is where some of your ERP applications and data will be in the cloud and some on premise. Sometimes this is referred to as two-tier ERP.

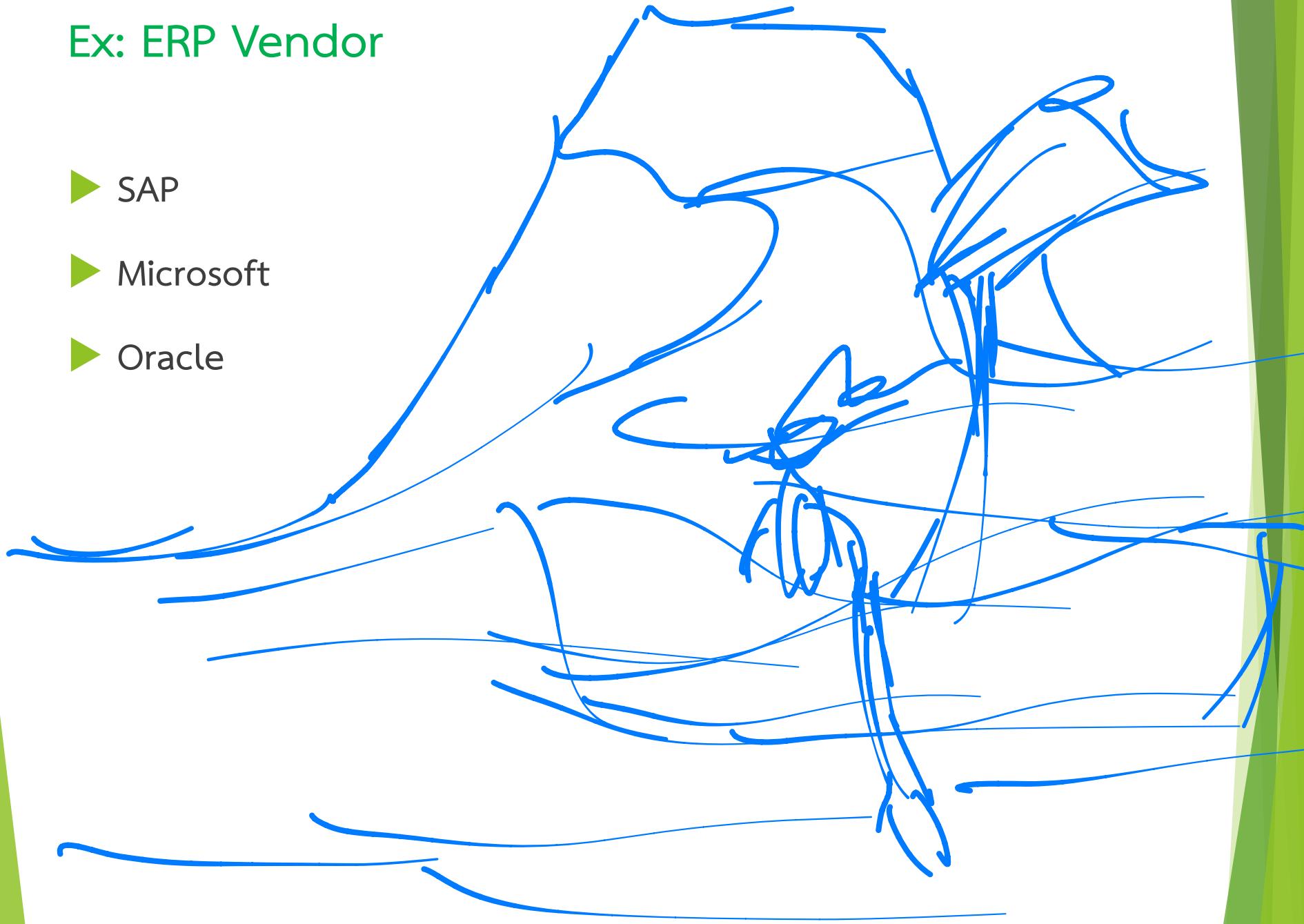


Ex: ERP Vendor

SAP

Microsoft

Oracle



Business Value of ERP Systems มูลค่าธุรกิจของระบบบริหารทรัพยากรองค์กร

- ▶ เพิ่มประสิทธิภาพการดำเนินงาน (Increase operational efficiency)
- ▶ ให้สารสนเทศที่ครอบคลุมทั้งองค์กร เพื่อสนับสนุนการตัดสินใจ (Provide firm wide information to support decision making)
- ▶ ช่วยให้ตอบกลับกับลูกค้าที่ต้องการสารสนเทศหรือผลิตภัณฑ์ที่ต้องการได้อย่างรวดเร็ว (Enable rapid responses to customer requests for information or products)
- ▶ มีเครื่องมือในการวิเคราะห์เพื่อการประเมินผลการปฏิบัติงานขององค์กร (Include analytical tools to evaluate overall organizational performance)