

# **INFO 7225**

## **Module 1**

- 1. Introduction to Accounting**
- 2. Accounting Information Flow**

### **3. Financial Statements**

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College of Engineering  
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1,000

Q3

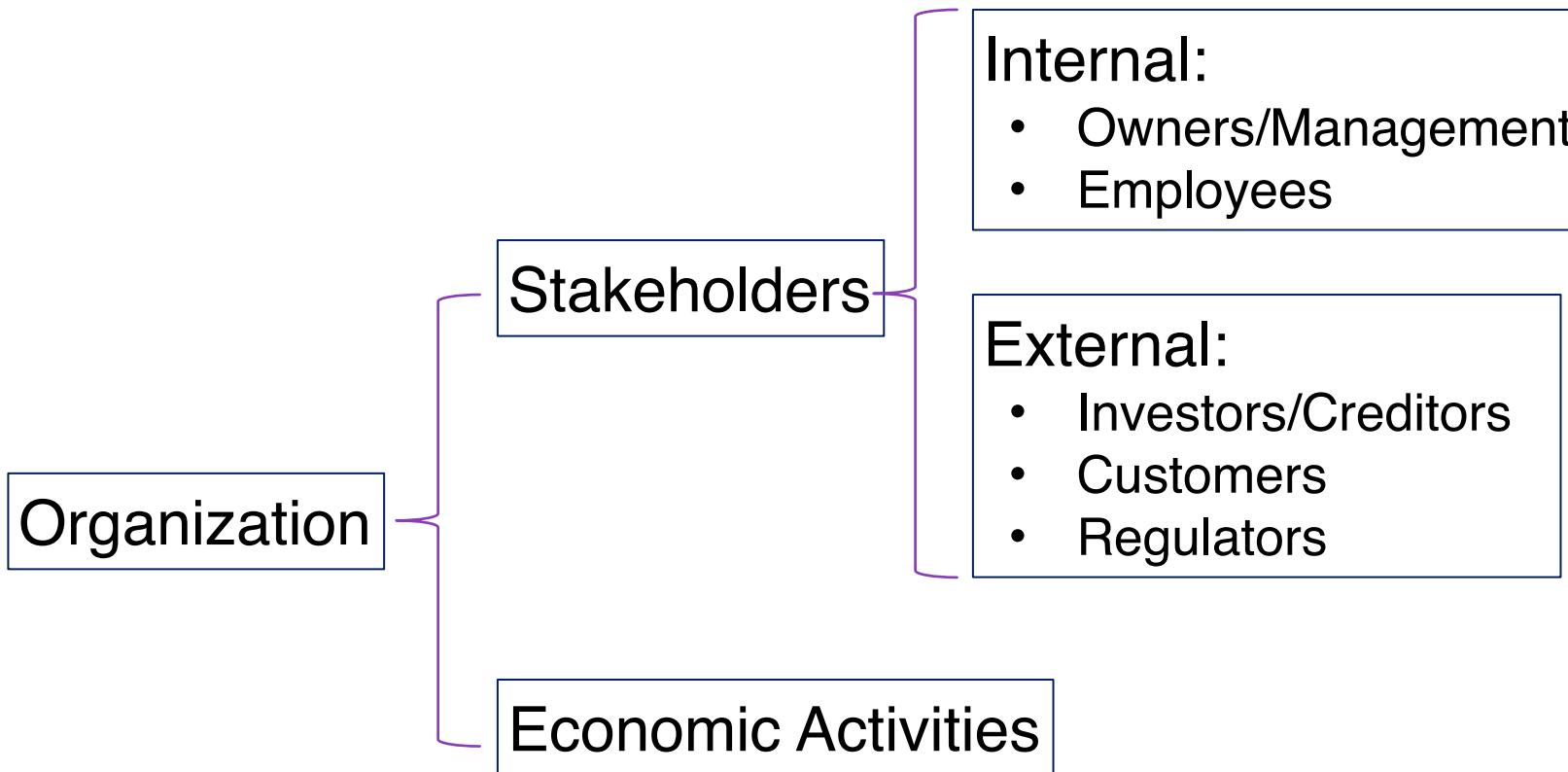
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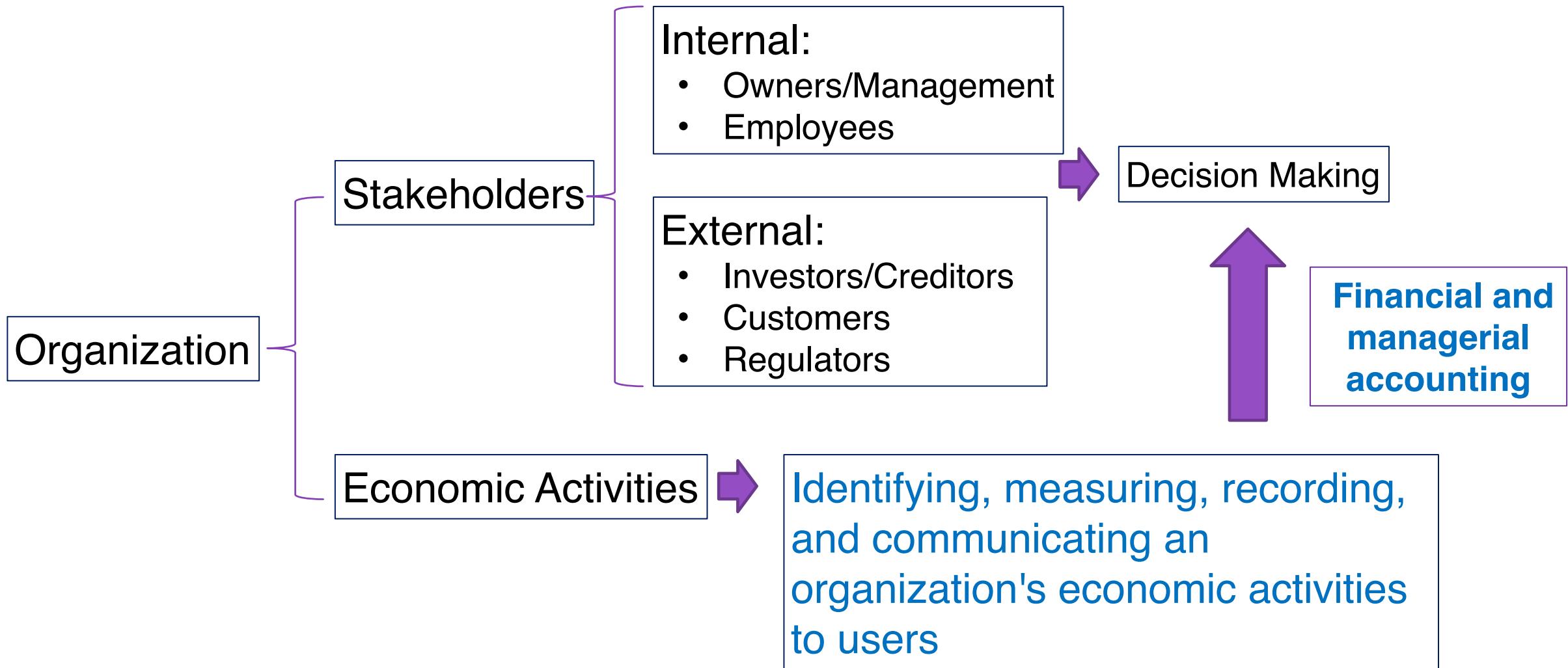


# **DEFINE ACCOUNTING AND ITS PURPOSES**

# Structure of an Organization



# Roles of Accounting

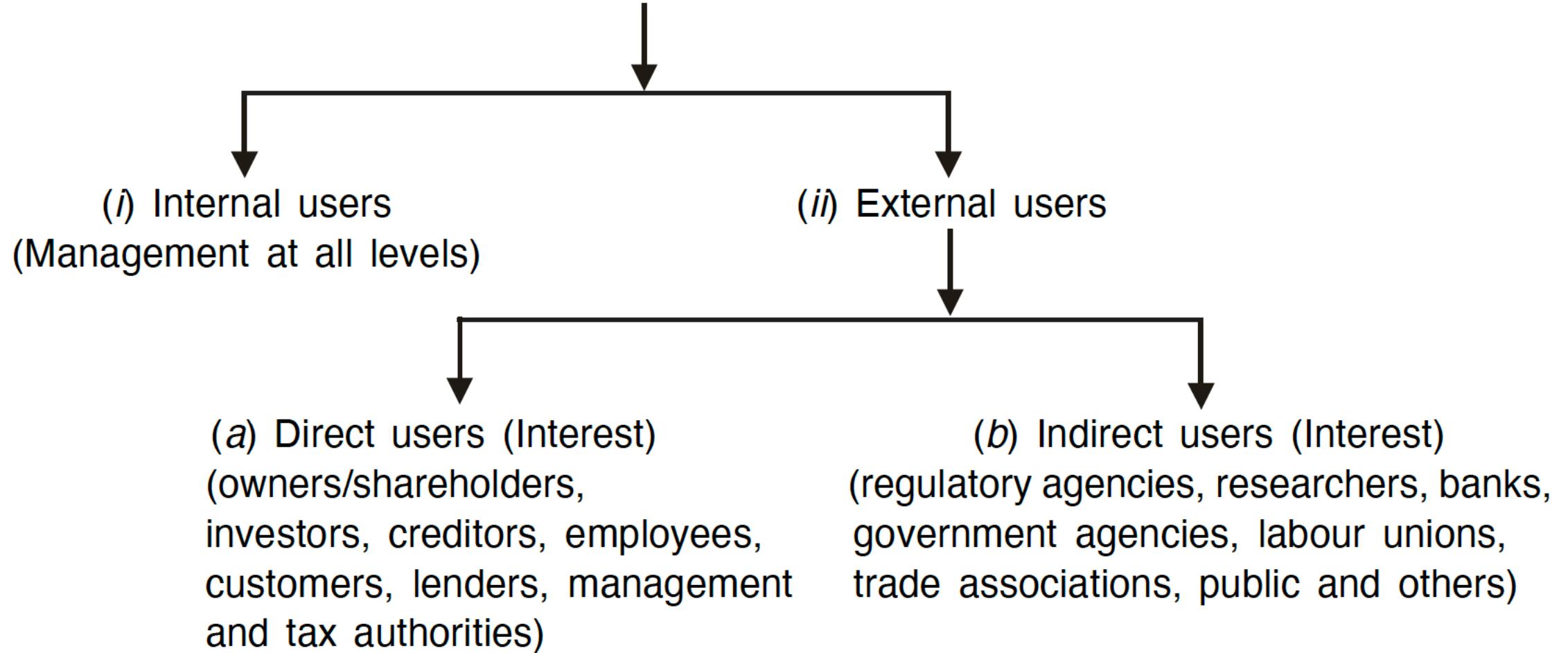


# Accounting Defined

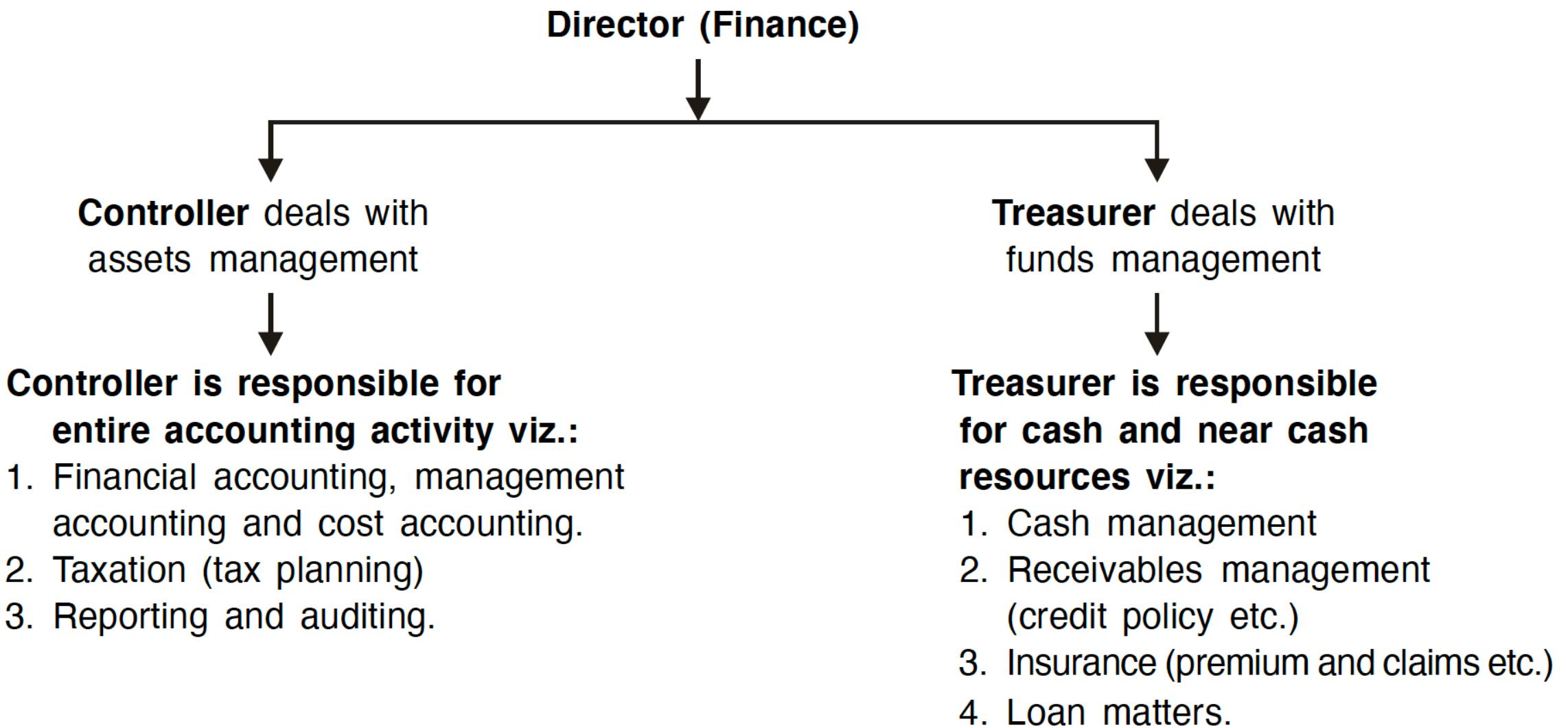
**Accounting is the process of identifying, measuring, recording, and communicating an organization's economic activities to users.**

- Users need information for decision making.
  - Internal users of accounting information work for the organization and are responsible for planning, organizing, and operating the entity. The area of accounting known as managerial accounting serves the decision-making needs of internal users.
  - External users do not work for the organization and include investors, creditors, labor unions, and customers. Financial accounting is the area of accounting that focuses on external reporting and meeting the needs of external users.
- This module addresses financial accounting. Managerial accounting will be covered in module 2.

## **Users of Accounting Information**



# ORGANIZATION STRUCTURE FOR ACCOUNTING AND FINANCE ACTIVITY

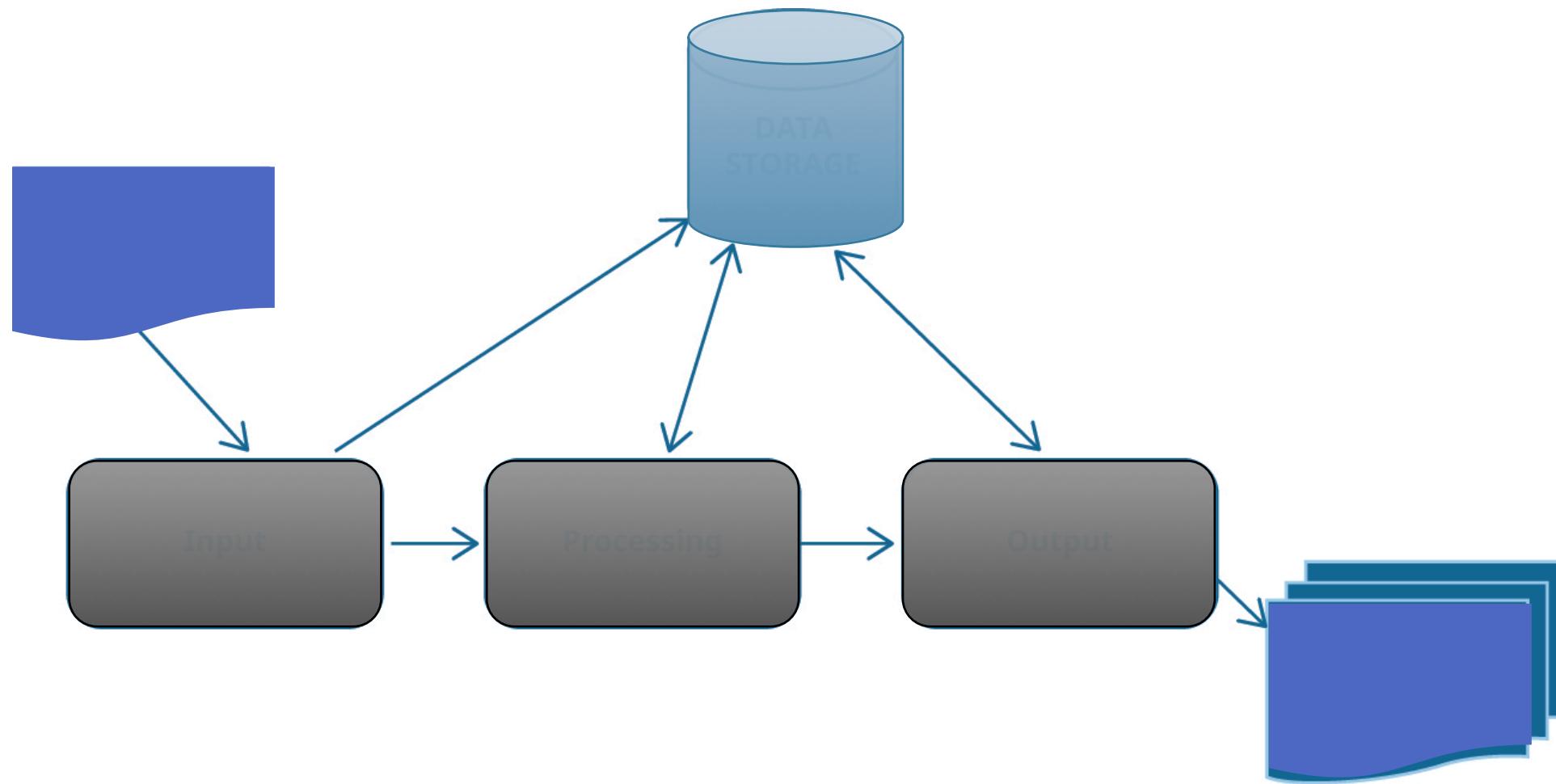


# Common Computerized Accounting Systems

- QuickBooks
  - Designed for small organizations
  
- SAP and Oracle
  - Designed for large and/or multinational organizations
  - Customized to meet the unique informational needs of the entity

# Accounting Information System:

## The key functions performed by an accounting information system



# Overall Structure of Module 1

**By the end of this module, you will understand:**

- **How the accounting information is being analyzed and processed;**
- How an accounting cycle is initiated and concluded
- How financial statements are prepared; and
- How business insights can be obtained from the output

**The basics:**

- GAAP
- Major classes of accounts
- Accounting documents
- Accounting equation
- Double-entry book-keeping system
- The financial statements

**Generally Accepted Accounting Principles (GAAP)**

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The basics:

- GAAP
- Major classes of accounts
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- Double-entry book-keeping system
- The financial statements



**The accounting cycle:**

- Analyze and process the accounting information



# Overall Structure of Module 1

**By the end of this module, you will understand:**

- How the accounting information is being analyzed and processed;
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- **How financial statements are prepared; and**
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**Preparing financial statements:**

- 
- Income Statement
  - Statement of Shareholders' Equity
  - Balance Sheet
  - Statement of Cash Flows

# Overall Structure of Module 1

**By the end of this module, you will understand:**

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- How financial statements are prepared; and
- **How business insights can be obtained from the output**

**Preparing financial statements:**

- Income Statement
- Statement of Shareholders' Equity
- Balance Sheet
- Statement of Cash Flows

**Financial statement analysis:**

- Liquidity
- Solvency
- Efficiency
- Profitability





# **Generally Accepted Accounting Principles (GAAP)**

# Accounting Information Must Possess the Quality of:

## Relevance

- Has the ability to make a difference in the decision-making process

## Verifiability

- Others are able to confirm that the information faithfully represents the economic activities of the business

## Faithful representation

- Is complete, neutral, and free from error

## Timeliness

- Is available to decision makers in time to be useful

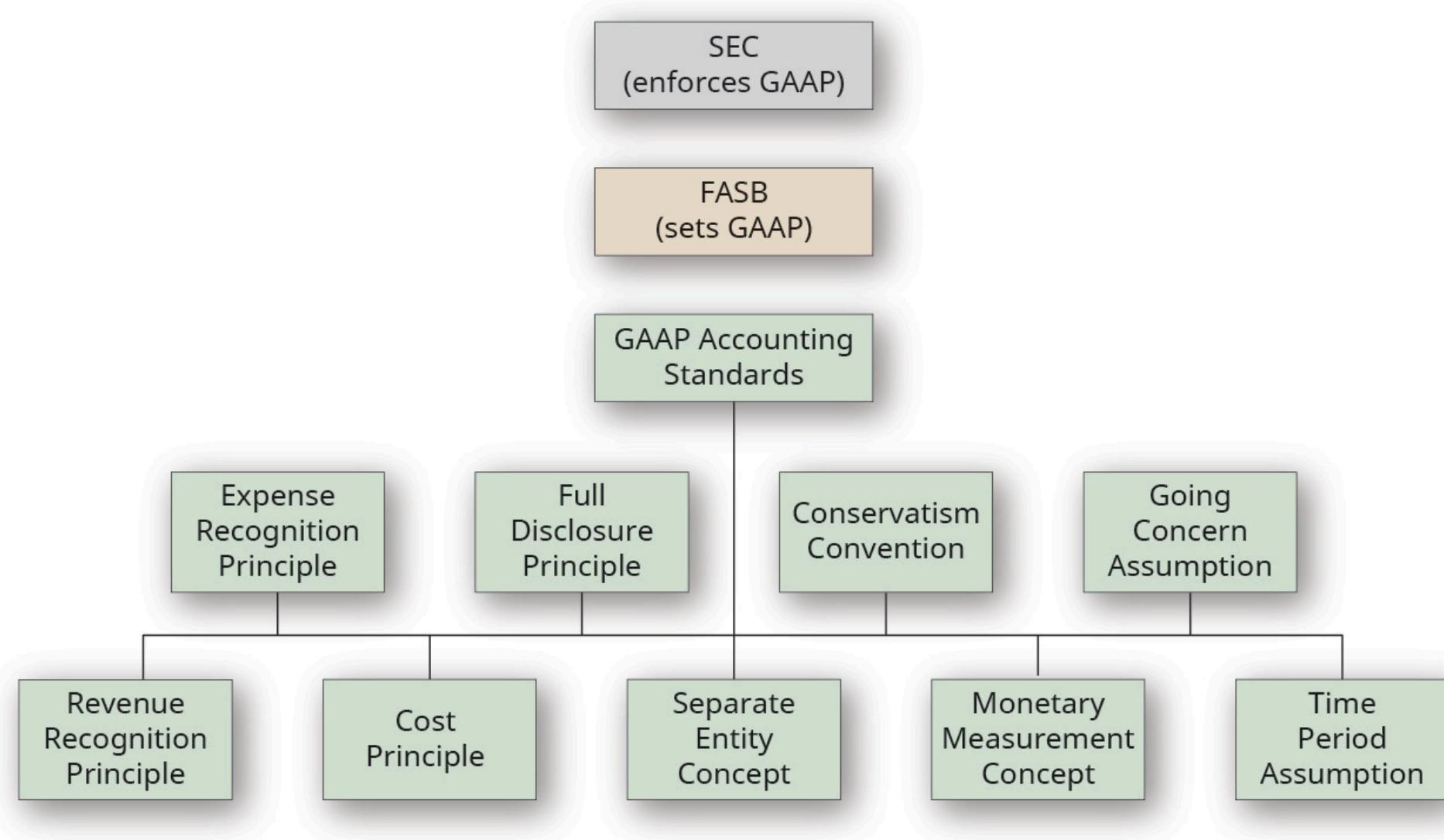
## Comparability

- Tells users of the information that businesses utilize similar accounting practices

## Understandability

- Is clear and concise

# GAAP Accounting Standards Connection Tree



# GAAP Accounting Standards Connection Tree

What is “ ”?

A business may only report activities on financial statements that are specifically related to company operations, not those activities that affect the owner personally.

SEC  
(enforces GAAP)

FASB  
(sets GAAP)

GAAP Accounting Standards

What is “ ”?

- Assumes a business will continue to operate in the foreseeable future.
- One should presume the business is doing well enough to continue operations unless there is evidence to the contrary.

Expense  
Recognition  
Principle

Full  
Disclosure  
Principle

Conservatism  
Convention

Going  
Concern  
Assumption

Revenue  
Recognition  
Principle

Cost  
Principle

Separate  
Entity  
Concept

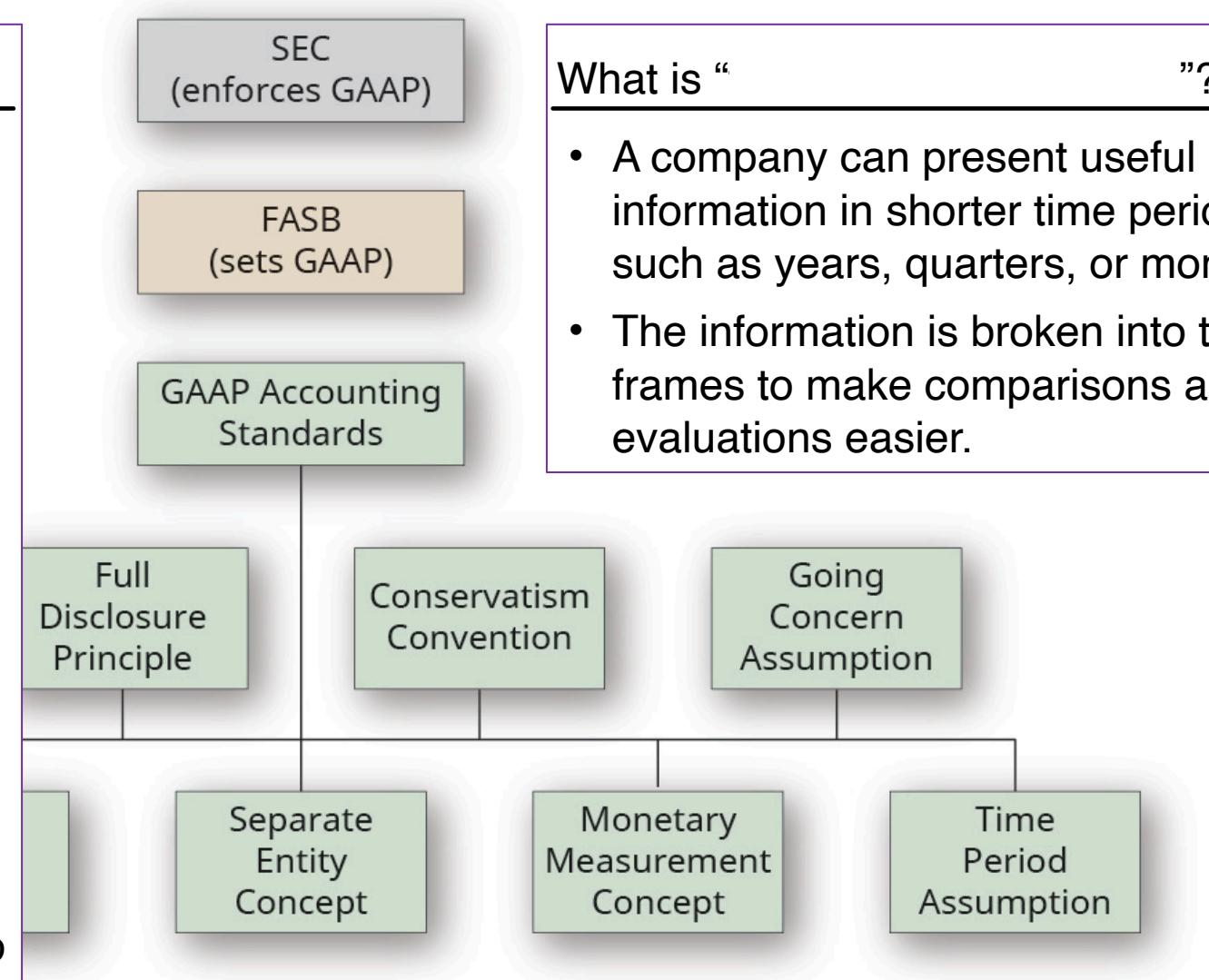
Monetary  
Measurement  
Concept

Time  
Period  
Assumption

# GAAP Accounting Standards Connection Tree

What is “ ”?

- In order to record a transaction, we need a system of *monetary measurement*, or a monetary unit by which to value the transaction.
- In the United States, this monetary unit is the US dollar. Without a dollar amount, it would be impossible to record information in the financial records.
- It also would leave stakeholders unable to make financial decisions, because there is no comparability measurement between companies.
- This concept ignores any change in the purchasing power of the \$ due to inflation (*nominal units of money*).



What is “ ”?

- A company can present useful information in shorter time periods, such as years, quarters, or months.
- The information is broken into time frames to make comparisons and evaluations easier.

# GAAP Accounting Standards Connection Tree

## What is “ ”?

- Directs a company to recognize revenue in the period in which it is earned; revenue is not considered earned until a product or service has been provided.
- This means the period of time in which you performed the service/gave the customer the product is the period in which rev. is recognized.
- No correlation between when cash is collected and when revenue is recognized.

Revenue Recognition Principle

Cost Principle

SEC  
(enforces GAAP)

FASB  
(sets GAAP)

GAAP Accounting Standards

Full Disclosure Principle

Conservatism Convention

Going Concern Assumption

Separate Entity Concept

Monetary Measurement Concept

Time Period Assumption

## What is “ ”?

- aka the historical cost principle, states that virtually everything the company owns or controls (assets) must be recorded at its value at the date of acquisition.
- Exceptions: financial instruments (recorded at their fair market value)

# GAAP Accounting Standards Connection Tree

## What is “ ”?

- States that a business must report any business activities that could affect what is reported on the financial statements.
- These activities could be nonfinancial in nature or be supplemental details not readily available on the main financial statement.
- Usually recorded in footnotes on the statements, or in addenda to the statements.

SEC  
(enforces GAAP)

FASB  
(sets GAAP)

GAAP Accounting Standards

Full Disclosure Principle

Conservatism Convention

Going Concern Assumption

Revenue Recognition Principle

Cost Principle

Separate Entity Concept

Monetary Measurement Concept

Time Period Assumption

## What is “ ”?

- States that if there is uncertainty in a potential financial estimate, a company should err on the side of caution and report the most conservative amount.
- Important when valuing a transaction for which the dollar value cannot be as clearly determined.

# GAAP Accounting Standards Connection Tree

What is “ ”?

- States that we must match expenses with associated revenues in the period in which the revenues were earned.
- Also referred to as the **matching principle**

SEC  
(enforces GAAP)

FASB  
(sets GAAP)

GAAP Accounting Standards

Expense Recognition Principle

Full Disclosure Principle

Conservatism Convention

Going Concern Assumption

Revenue Recognition Principle

Cost Principle

Separate Entity Concept

Monetary Measurement Concept

Time Period Assumption



# **Five Classes of Accounts**

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# FIVE CLASSES OF ACCOUNTS

1. Assets
2. Liabilities
3. Equity
4. Revenues
5. Expenses

# FIVE CLASSES OF ACCOUNTS: DEFINITION

1. Assets
2. Liabilities
3. Equity
4. Revenues
5. Expenses

What are \_\_\_\_\_?

- Probable future sacrifice of economic benefits arising from present obligations of a particular entity to transfer assets or provide services to other entities in the future as a result of past transactions or events
  - Current \_\_\_\_\_: debt or obligation due within one year or, in rare cases, a company's standard operating cycle, whichever is greater
  - Non-current \_\_\_\_\_: \_\_\_\_\_ that is expected to be settled in more than one year

# FIVE CLASSES OF ACCOUNTS: DEFINITION

1. Assets
2. Liabilities
3. Equity
4. Revenues
5. Expenses

What are ?

- Tangible or intangible resource owned or controlled by a company, individual, or other entity with the intent that it will provide economic value
  - Current \_\_\_ = \_\_\_ that will be used or consumed in one year or less
  - Noncurrent \_\_\_ = \_\_\_ that will be used or consumed over more than one year

What is ?

- Residual interest in the assets of an entity that remains after deducting its \_\_\_\_\_.
  - \_\_\_\_\_: corporation's primary class of stock issued, with each share representing a partial claim to ownership or a share of the company's business
  - \_\_\_\_\_: cumulative, undistributed net income or net loss for the business since its inception. = **net income - dividends**

# FIVE CLASSES OF ACCOUNTS: DEFINITION

1. Assets
2. Liabilities
3. Equity
4. Revenues
5. Expenses

What are \_\_\_\_\_ ?

- Inflows or other enhancements of assets of an entity or settlements of its liabilities (or a combination of both) from delivering or producing goods, rendering services, or other activities that constitute the entity's ongoing major or central operations

What are \_\_\_\_\_ ?

- Cost associated with providing goods or services

# FIVE CLASSES OF ACCOUNTS: EXAMPLES

1. Assets
2. Liabilities
3. Equity
4. Revenues
5. Expenses

Accounts Payable (AP)	2	Land	1
Accounts Receivable (AR)	1	Notes Payable	2
Bonds Payable	2	Raw Material Expense	5
Building	1	Retained Earnings	3
Cash	1	Sales	4
Common Stock	3	Service Revenue	4
Equipment	1	Supplies	1
Fees Earned	4	Unearned Revenue	2
Prepaid Insurance	1	Utility	5
Interest payable	2	Wage Payable	2
Interest expense	5	Wage Expense	5
Inventory	1	Warranty Liability	2

# Chart of Accounts (1)

**ACCOUNT**
**CODE**
**ACCOUNT NAME**

<b>100–199</b>	<b>Current Assets</b>
101	Checking Account
102	Savings Account
103	Petty Cash
120	Accounts Receivable
125	Allowance for Doubtful Accounts
130	Notes Receivable
150	Inventory
160	Supplies
170	Prepaid Rent
180	Prepaid Insurance
<b>200–299</b>	<b>Noncurrent Assets</b>
200	Land
210	Buildings
215	Accumulated Depreciation—Buildings
230	Equipment
235	Accumulated Depreciation—Equipment
240	Furniture & Fixtures
245	Accumulated Depreciation—Furniture & Fixtures
250	Other Assets

**ACCOUNT**
**CODE**
**ACCOUNT NAME**

<b>300–399</b>	<b>Liabilities</b>
300	Accounts Payable
310	Wages Payable
321	Employee Income Tax Payable
322	FICA Tax Payable
323	Federal Unemployment Tax Payable
324	State Unemployment Tax Payable
330	Accrued Interest Payable
360	Other Liabilities
<b>400–499</b>	<b>Equity Accounts</b>
400	Common Stock
410	Retained Earnings

# Chart of Accounts (2)

**ACCOUNT**
**CODE**
**ACCOUNT NAME**
**500–599      Revenues**

501      Cash Sales

502      Credit Sales

510      Sales Returns &amp; Allowances

511      Sales Discounts

520      Interest Revenue      its

530      Miscellaneous Revenue

**600–799      Expenses**

600      Cost of Goods Sold

611      Wages Expense

612      Commissions Expense

613      Payroll Tax Expense

620      Rent Expense

630      Insurance Expense

640      Supplies Expense

650      Bad Debt Expense

701      Depreciation Expense—Buildings

702      Depreciation Expense—Equipment

703      Depreciation Expense—Furniture &amp; Fixtures

710      Income Tax Expense

**900–999      Summary Accounts**

910      Income Summary

# **Accounting Records: Journals and Documents**

# ACCOUNTING RECORDS: JOURNALS

- A *journal* is a chronological record of financial transactions.
  - **Journal entry:**
    - At some point during the transaction process, when all relevant facts about the transaction are known, the event is recorded in a journal in *chronological* order.
- The primary **sources** of data entry into journals are documents.

# ACCOUNTING RECORDS: DOCUMENTS

## Source Documents

- Economic events result in the creation of some documents at the beginning (the source) of the transaction.
- These are called source documents and are used to capture and formalize transaction data that the transaction cycle uses for processing.

## Product Documents

- They are the result of transaction processing rather than the triggering mechanism for the process.
  - For example, a payroll check to an employee is a product document of the payroll system.

## Turnaround Documents

- Product documents of one system that become source documents for another system.

# Example: Documents Used and Generated in a Sales Process

Source document:

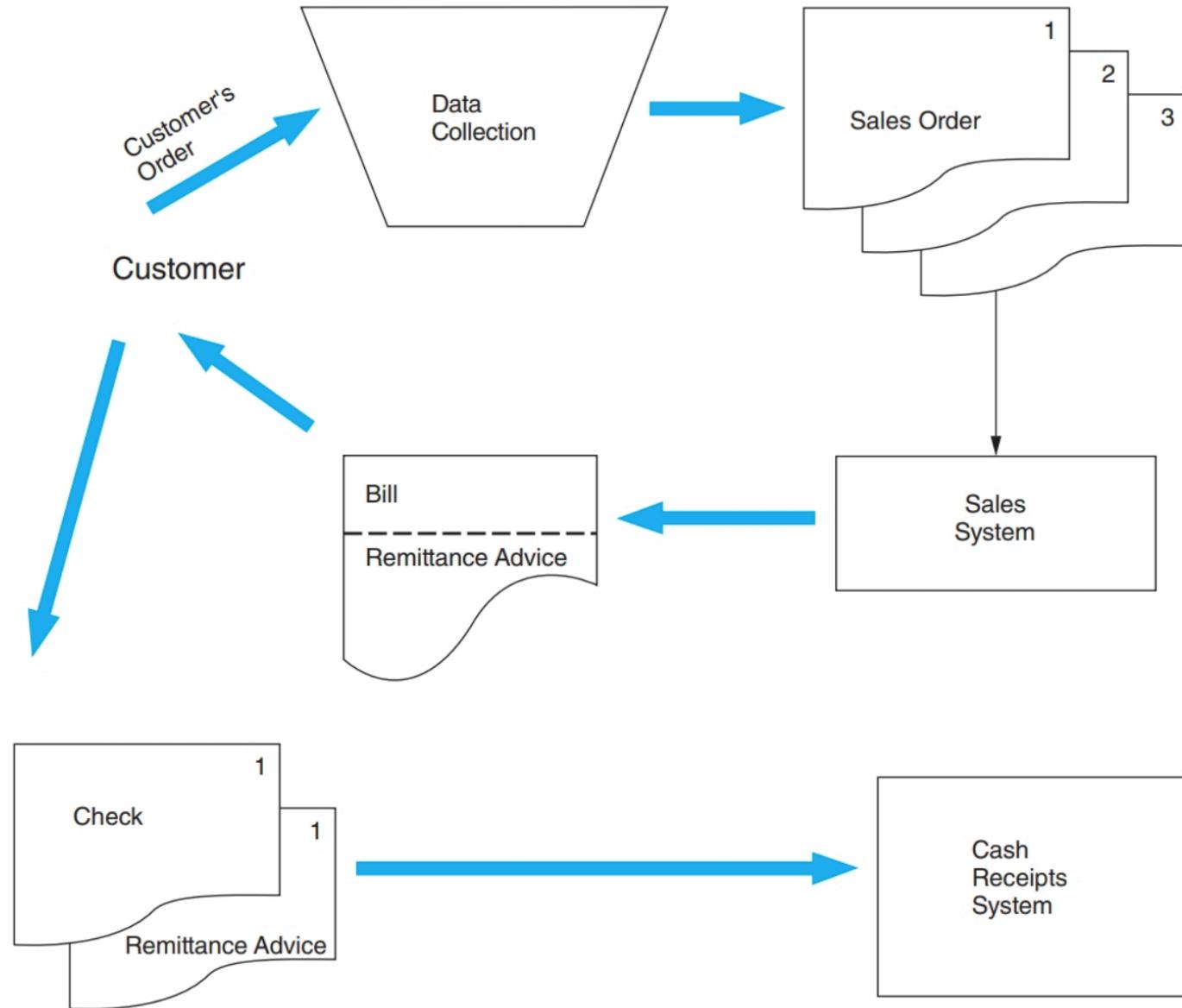
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Product document:

—

Turnaround document:

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# TWO CLASSES OF JOURNALS

## General Journal

- Firms use the general journal to record nonrecurring, infrequent, and dissimilar transactions.
  - For example, depreciation and closing entries are typically recorded in the ~

## Special Journal

- A journal used to record a large number of repetitive transactions such as
  - Credit sales, cash receipts, purchases, and cash disbursements

## GENERAL JOURNAL

PAGE

	DATE	DESCRIPTION	POST. REF.	DEBIT	CREDIT	
1	Sept. 1, 20xx	Depreciation Expense	520	5 0 0 0		1
2		Accumulated Depreciation	210		5 0 0 0	2
3						3
4	Sept. 2, 20xx	Insurance Expense	525	1 2 0 0		4
5		Prepaid Insurance	180		1 2 0 0	5
6						6
7	Sept. 3, 20xx	Cash	101	1 1 0 0 0		7
8		Capital Stock	310		1 1 0 0 0	8
9						9
10						10
11						11
12						12

## Special journal example: a sales journal

Date	Customer	Invoice Num.	Acct. Num.	Post	Debit	Credit Sales #401
					Acct. Rec. #102	
Sept. 1	Hewitt Co.	4523	1120		3300	3300
15	Acme Drilling	8821	1298		6825	6825
Oct. 3	Buell Corp.	22987	1030		4000	4000
10	Check Ltd.	66734	1110		8500	8500

# ACCOUNTING RECORDS

## ■ Documents

- Source documents
- Product documents
- Turnaround documents

## ■ Journal (chronological records)

- General journal
- Special journal

## ■ Ledger (organized by accounts)

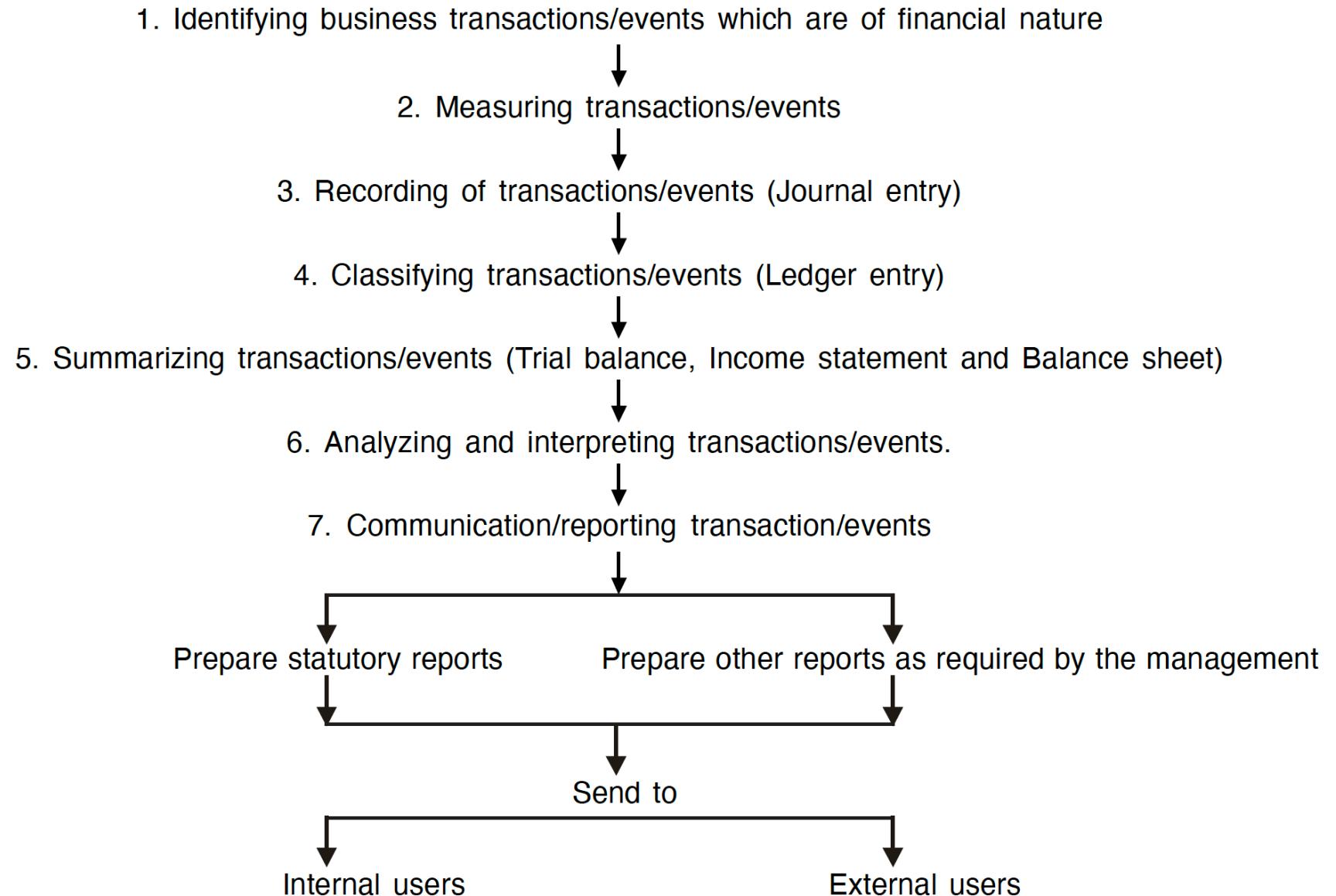
### ➤ General ledger

- A ledger that contains summary-level data for every asset, liability, equity, revenue, and expense account of the organization.
- Examples: AR, AP

### ➤ Subsidiary ledger

- A ledger used to record detailed data for a general ledger account with many individual subaccounts
- Breaks down certain general ledger accounts to provide more detailed information to users

# **Accounting Information Flow / Steps in Accounting Process**





# The Accounting Equation

# THE ACCOUNTING EQUATION

ASSETS = LIABILITIES + EQUITY  
(economic resources (creditors' claims (owners' claims  
owned by an entity) on assets) on assets)

Cash + Accounts + Prepaid + Equipment + Truck Receivable Insurance	=	Accounts + Unearned + Notes + Common + Retained Payable Revenue Payable Stock Earnings
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## **EXERCISE 1–7 (LO4) Calculating Financial Statement Components**

The following information is taken from the records of Jasper Inc. at January 31, 2015, after its first month of operations. Assume no dividends were declared in January.

Cash	\$33,000	Equipment	\$30,000
Accounts receivable	82,000	Notes payable	15,000
Unused supplies	2,000	Accounts payable	27,000
Land	25,000	Common stock	?
Building	70,000	Net income	40,000

**Required:**

- a. Calculate total assets.
- b. Calculate total liabilities.
- c. Calculate common stock.
- d. Calculate retained earnings.
- e. Calculate total equity.



# Normal Balance of Major Accounts

# A | L E - R | E

Assets and Expenses have what is known as a normal **debit** balance.

- This simply means that the balance of that item will increase if it is debited, and it will decrease if it is credited.

Liabilities, Equity, and Revenue have normal **credit** balances.

- This means that in order to increase any of these accounts, you would need to credit them.

# THE ACCOUNTING EQUATION

*Transaction: a small business borrowed \$2,000 from a local bank.*

$$\text{ASSETS} = \text{LIABILITIES} + \text{EQUITY}$$

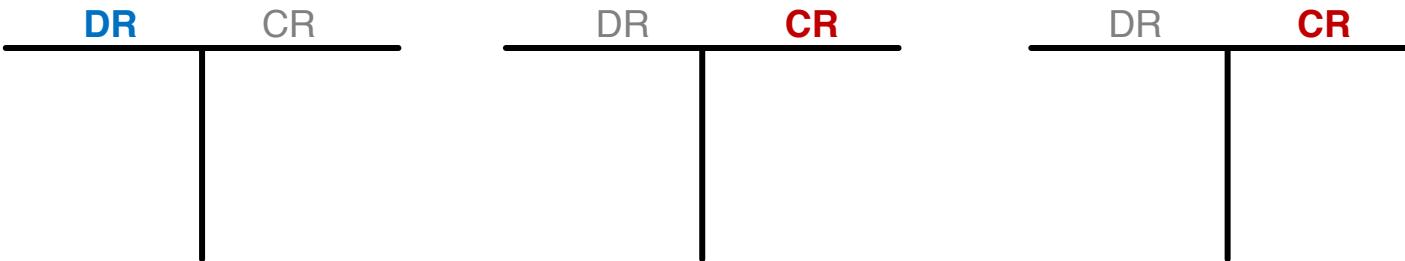
(economic resources (creditors' claims (owners' claims  
owned by an entity) on assets) on assets)

Cash + Accounts + Prepaid + Equipment + Truck = Accounts + Unearned + Notes + Common + Retained  
Receivable Insurance Payable Revenue Payable Stock Earnings

GENERAL JOURNAL			
Date	Account Title	Debit	Credit

# NORMAL BALANCE OF MAJOR ACCOUNTS

## Balance Sheet



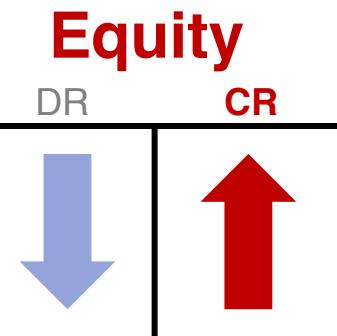
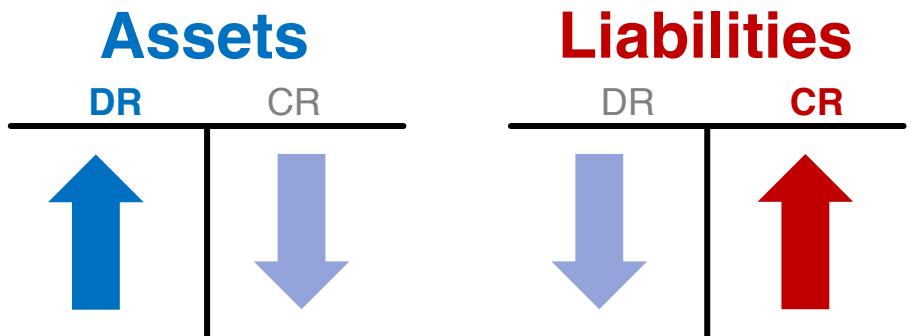
## Income Statement



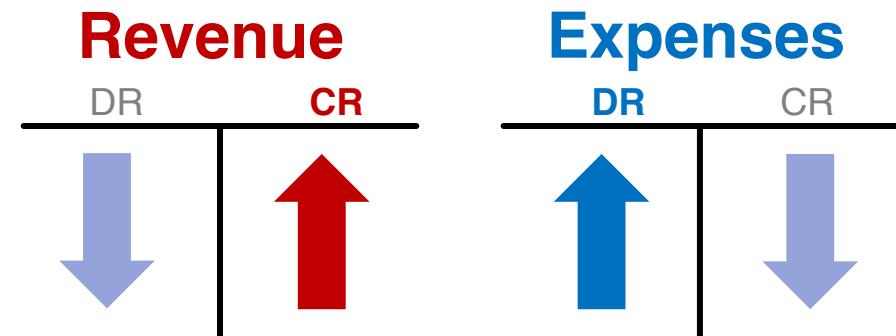
A | LE - R | E

# NORMAL BALANCE OF MAJOR ACCOUNTS

## Balance Sheet



## Income Statement



A | LE - R | E

# CONTRA ACCOUNTS

- A *contra account* is an account that is related to another account and typically has an opposite normal balance that is subtracted from the balance of its related account on the financial statements.
  - Contra accounts to sales or revenue (contra revenue accounts):
    - Sales returns
    - Sale discounts
  - Allowance for doubtful accounts (a contra accounts receivable account)
  - Accumulated depreciation (a contra fixed assets account)



# Financial Statements

# The Income Statement

Big Dog Carworks Corp.	
Income Statement	
For the Month Ended January 31, 2015	
<i>Revenues</i>	
Repair revenues	\$
<i>Expenses</i>	
Rent expense	\$
Salaries expense	
Supplies expense	
Fuel expense	
Total expenses	_____
Net income	_____
	=====

The heading shows the name of the entity, the type of financial statement, and the period-in-time date.

## The Income Statement

Big Dog Carworks Corp.

Income Statement

For the Month Ended January 31, 2015

*Revenues*

Repair revenues	\$10,000
-----------------	----------

*Expenses*

Rent expense	\$1,600
--------------	---------

Salaries expense	3,500
------------------	-------

Supplies expense	2,000
------------------	-------

Fuel expense	700
--------------	-----

Total expenses	<u>7,800</u>
----------------	--------------

Net income	<u><u>\$2,200</u></u>
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## The Income Statement

Big Dog Carworks Corp.  
Income Statement  
For the Month Ended January 31, 2015

*Revenues*

Repair revenues	\$10,000
-----------------	----------

*Expenses*

Rent expense	\$1,600
--------------	---------

Salaries expense	3,500
------------------	-------

Supplies expense	2,000
------------------	-------

Fuel expense	700
--------------	-----

Total expenses	<hr/>
----------------	-------

Net income	<hr/> <hr/> <hr/>
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The net income is transferred to the statement of stockholders' equity.

## Statement of Shareholders ' Equity

Big Dog Carworks Corp.  
Statement of Stockholders' Equity  
For the Month Ended January 31, 2015

	Common Stock	Retained Earnings	Total Equity
Opening balance			
Ending balance	_____	_____	_____

The heading shows the name of the entity, the type of financial statement, and the period-in-time date.

## Statement of Shareholders ' Equity

Big Dog Carworks Corp.  
Statement of Stockholders' Equity  
For the Month Ended January 31, 2015

	Common Stock	Retained Earnings	Total Equity
Opening balance			
Stock issued			
Net income			
Dividends			
Ending balance	_____	_____	_____
	=====	=====	=====

## Statement of Shareholders ' Equity

Big Dog Carworks Corp.  
Statement of Stockholders' Equity  
For the Month Ended January 31, 2015

	Common Stock	Retained Earnings	Total Equity
Opening balance	\$ -0-	\$ -0-	\$ -0-
Stock issued	10,000		10,000
Net income		2,200	2,200
Dividends		(200)	(200)
Ending balance	<u><u>\$10,000</u></u>	<u><u>\$2,000</u></u>	<u><u>\$12,000</u></u>

## Statement of Shareholders ' Equity

Big Dog Carworks Corp.  
Statement of Stockholders' Equity  
For the Month Ended January 31, 2015

	Common Stock	Retained Earnings	Total Equity
Opening balance	\$ -0-	\$ -0-	\$ -0-
Stock issued	10,000		10,000
Net income		2,200	2,200
Dividends		(200)	(200)
Ending balance	<u><u>\$10,000</u></u>	<u><u>\$2,000</u></u>	<u><u>\$12,000</u></u>

These totals are transferred  
to the balance sheet at Jan-  
uary 31, 2015.

# The Balance Sheet

**Big Dog Carworks Corp.**  
**Balance Sheet**  
**At January 31, 2015**

The heading shows the name of the entity, the type of financial statement, and the point-in-time date.

## The Balance Sheet

Big Dog Carworks Corp.  
Balance Sheet  
At January 31, 2015

Assets	Liabilities
Cash \$ 3,700	Accounts payable \$ 700
Accounts receivable 2,000	Unearned revenue 400
Prepaid insurance 2,400	Notes payable 6,000
Equipment 3,000	Total liabilities \$ 7,100
Truck 8,000	
Total assets \$ 19,100	
Equity	
Common stock \$10,000	\$10,000
Retained earnings 2,000	2,000
Total equity 12,000	12,000
Total liabilities and equity \$ 19,100	<u><u>\$ 19,100</u></u>

## The Balance Sheet

Big Dog Carworks Corp.  
Balance Sheet  
At January 31, 2015

Assets	Liabilities
Cash \$ 3,700	Accounts payable \$ 700
Accounts receivable 2,000	Unearned revenue 400
Prepaid insurance 2,400	Notes payable 6,000
Equipment 3,000	Total liabilities \$ 7,100
Truck 8,000	
Total assets \$19,100	Equity
	Common stock \$10,000
	Retained earnings 2,000
	Total equity 12,000
	Total liabilities and equity \$19,100

Total assets (\$19,100 here)  
always equal Total liabilities  
(\$7,100) plus Equity (\$12,000).

# Differentiate between operating, investing, and financing activities

Operations



- Provided by sales/revenue
- Used in operations – expenses (vendors and employees) and inventory purchases

Investing



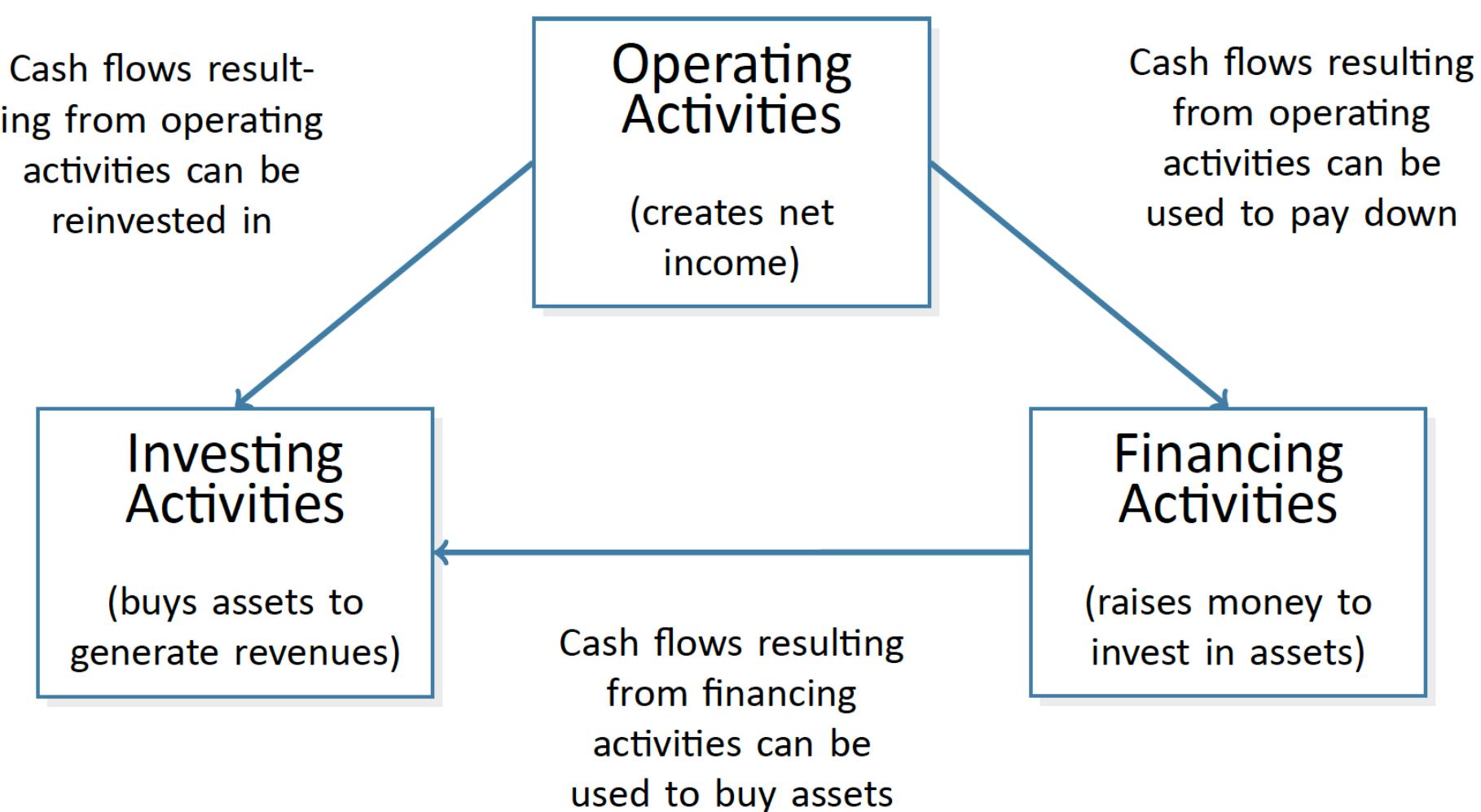
- Proceeds from the sale of fixed assets or other investments
- Used in purchasing new equipment, facilities, and investing excess cash into investment vehicles

Finance



- Provided via borrowings or equity infusions from shareholders
- Used for paying principal payments on debt owed and dividends or distributions paid out to shareholders

# RELATIONSHIPS AMONG THE THREE TYPES OF BUSINESS ACTIVITIES



# Statement of Cash Flows

Big Dog Carworks Corp.  
Statement of Cash Flows  
For the Month Ended January 31, 2015

The heading shows the name of the entity, the type of financial statement, and the period-in-time date.

# Statement of Cash Flows

Big Dog Carworks Corp.  
Statement of Cash Flows  
For the Month Ended January 31, 2015

Operating activities:	
Net income	\$
Adjustments:	
Increase in accounts receivable	
Increase in prepaid insurance	
Increase in accounts payable	
Increase in unearned revenues	
Net cash used by operating activities	\$
Investing activities:	
Purchase of equipment	
Purchase of truck	
Net cash used by investing activities	\$
Financing activities:	
Issued shares of stock	
Borrowed from bank	
Payment on bank loan	
Paid dividends	
Net cash provided by financing activities	\$
Net increase in cash	
Cash balance, January 1	
Cash balance, January 31	\$

# Statement of Cash Flows

Big Dog Carworks Corp.  
Statement of Cash Flows  
For the Month Ended January 31, 2015

Operating activities:	
Net income	\$ 2,200
Adjustments:	
Increase in accounts receivable	(2,000)
Increase in prepaid insurance	(2,400)
Increase in accounts payable	700
Increase in unearned revenues	400
Net cash used by operating activities	<u><u>\$ (1,100)</u></u>
Investing activities:	
Purchase of equipment	\$ (3,000)
Purchase of truck	(3,000)
Net cash used by investing activities	<u><u>\$ (6,000)</u></u>
Financing activities:	
Issued shares of stock	\$10,000
Borrowed from bank	3,000
Payment on bank loan	
Paid dividends	(200)
Net cash provided by financing activities	<u><u>\$ 10,800</u></u>
Net increase in cash	3,700
Cash balance, January 1	-0-
Cash balance, January 31	<u><u>\$3,700</u></u>

# Statement of Cash Flows

Big Dog Carworks Corp.  
Statement of Cash Flows  
For the Month Ended January 31, 2015

Operating activities:	
Net income	\$ 2,200
Adjustments:	
Increase in accounts receivable	(2,000)
Increase in prepaid insurance	(2,400)
Increase in accounts payable	700
Increase in unearned revenues	400
Net cash used by operating activities	<u><u>\$ (1,100)</u></u>
Investing activities:	
Purchase of equipment	\$ (3,000)
Purchase of truck	(3,000)
Net cash used by investing activities	<u><u>\$ (6,000)</u></u>
Financing activities:	
Issued shares of stock	\$10,000
Borrowed from bank	3,000
Payment on bank loan	
Paid dividends	(200)
Net cash provided by financing activities	<u><u>\$ 10,800</u></u>
Net increase in cash	3,700
Cash balance, January 1	-0-
Cash balance, January 31	<u><u>\$ 3,700</u></u>

This agrees with the Cash amount shown on the Balance Sheet at January 31, 2015.

# SUMMARY

- GAAP
- Accounting records
- Five classes of accounts

- Accounting equation
- Normal balance of each account
- Four financial statements

# INFO 7225

## Module 1

### 4. Analyzing & Recording Transactions

Professor ShaoMing Shi  
College of Engineering  
Northeastern University

1,000

Q3 Q4





**A practice quiz will be available from the Canvas “Quizzes”. Please complete it on time to get accustomed to the Canvas Quiz format. It will not be counted towards the final grade.**



# **Analyzing and Recording Business Transactions**

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# LEARNING OBJECTIVES

**After completing this class, you should be able to**

- Analyze transactions using the accounting equation;
- Record transactions in a general journal using the double-entry system;
- Post journal information in a general ledger;
- Prepare an unadjusted trial balance.

# THE ACCOUNTING EQUATION

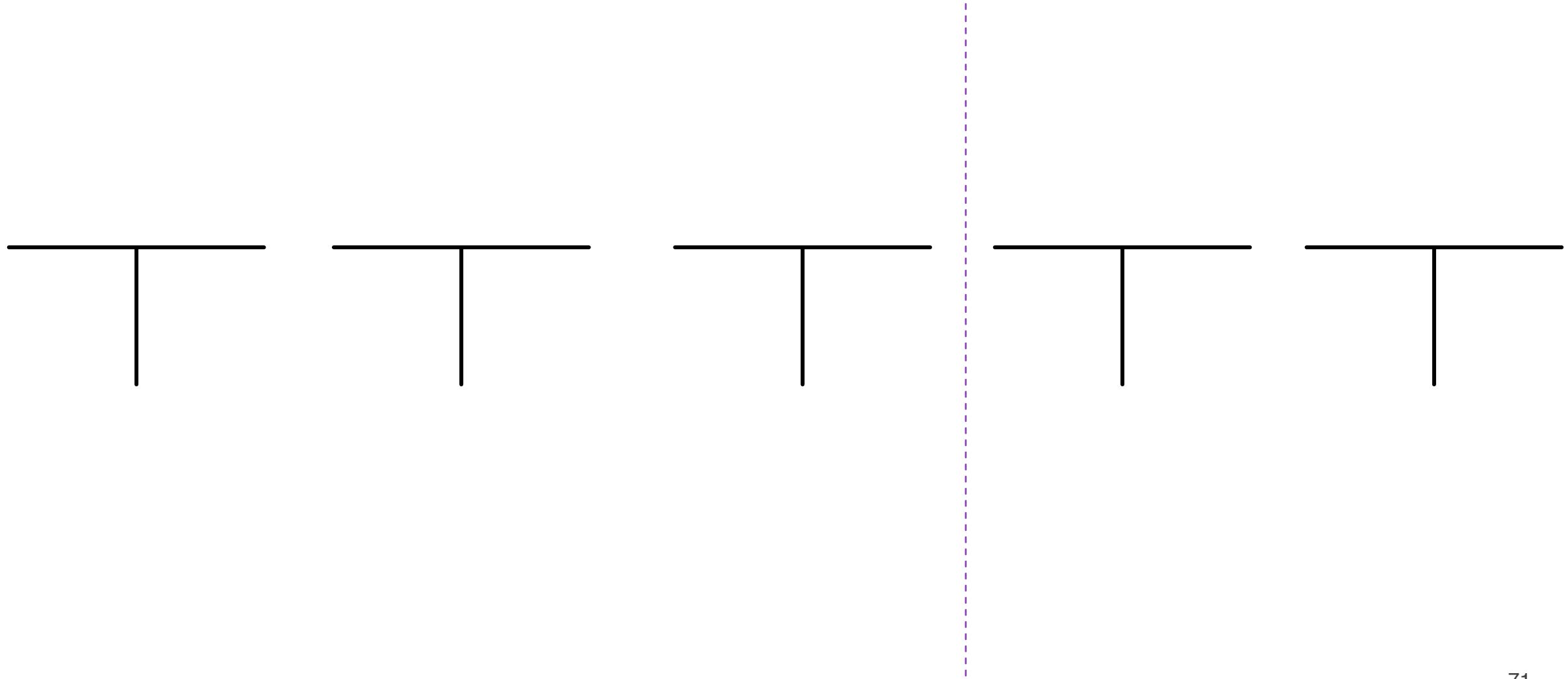
**ASSETS**  
(economic resources  
owned by an entity)      =      **LIABILITIES**  
(creditors' claims  
on assets)      +      **EQUITY**  
(owners' claims  
on assets)

Cash + Accounts + Prepaid + Equipment + Truck Receivable      Insurance	=	Accounts + Unearned + Notes + Common + Retained Payable      Revenue      Payable      Stock      Earnings
--	---	---

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# NORMAL BALANCE OF MAJOR ACCOUNTS



# IN-CLASS EXERCISE

- Indicate the net effect ( $\uparrow$  for increase;  $\downarrow$  for decrease; 0 for no effect) of each of the following transactions on each part of the accounting equation, Assets = Liabilities + Equity.
- For example, for payment of an accounts payable balance,  $A(\downarrow) = L(\downarrow) + E(0)$ 
  - A. Payment of principal balance of note payable  $A(\ ) = L(\ ) + E(\ )$
  - B. Purchase of supplies for cash  $A(\ ) = L(\ ) + E(\ )$
  - C. Payment of dividends to stockholders  $A(\ ) = L(\ ) + E(\ )$
  - D. Issuance of stock for cash  $A(\ ) = L(\ ) + E(\ )$
  - E. Billing customer for physician services provided  $A(\ ) = L(\ ) + E(\ )$

Record the debit and credit in the appropriate account for each of the following transactions:

#	Transaction Description	Debit	Credit
1	Issued common stock for cash.		
2	Purchased equipment on credit.		
3	Paid for a one-year insurance policy.		
4	Billed a customer for repairs completed today.		
5	Paid this month's rent.		
6	Collected the amount billed in transaction 4 above.		
7	Collected cash for repairs completed today.		
8	Paid for the equipment purchased in transaction 2 above.		
9	Signed a union contract.		
10	Collected cash for repairs to be made for customers next month.		
11	Transferred this month's portion of prepaid insurance that was used to Insurance Expense.		



# Analyzing Business Transactions

**Transactions summary:**

1. Issued share capital for \$10,000 cash.
2. Received a bank loan for \$3,000.
3. Purchased equipment for \$3,000 cash.
4. Purchased a truck for \$8,000; paid \$3,000 cash and incurred a bank loan for the balance.
5. Paid \$2,400 for a comprehensive one-year insurance policy effective January 1.
6. Paid \$2,000 cash to reduce the bank loan.
7. Received \$400 as an advance payment for repair services to be provided over the next two months as follows: \$300 for February, \$100 for March.
8. Performed repairs for \$8,000 cash and \$2,000 on credit.
9. Paid a total of \$7,100 for operating expenses incurred during the month; also incurred an expense on account for \$700.
10. Dividends of \$200 were paid in cash to the only shareholder, Bob Baldwin.

**Transaction #****Effect on the Accounting Equation**

	<b>Asset</b>	<b>=</b>	<b>Liabilities</b>	<b>+</b>	<b>Equity</b>
1					
2					
3					
4					
5					
6					
7					
8					
9					
10					

Trans.	ASSETS					=	LIABILITIES			=	EQUITY								
	Cash	+	Acc. Rec.	+	Prepaid Insur.	+	Equip.	+	Truck	=	Acc. Pay.	+	Unearned Revenue	+	Notes Pay.	+	Common Stock	+	Retained Earnings
1.																			
2.																			
3.																			
4.																			
5.																			
6.																			
7.																			
8.																			
9.																			
10.																			

Figure 1.3: Transactions Worksheet for January 31, 2015

These numbers are used to prepare the Income Statement.

Transactions in these columns are used to prepare the Statement of Shareholders' Equity.

Column totals are used to prepare the Balance Sheet.

ASSETS = \$

LIABILITIES + EQUITY = \$

Trans.	ASSETS					=	LIABILITIES			+	EQUITY									
	Cash	+	Acc. Rec.	+	Prepaid Insur.	+	Equip.	+	Truck	=	Acc. Pay.	+	Unearned Revenue	+	Notes Pay.	+	Common Stock	+	Retained Earnings	
1.	+10,000																+10,000			
2.	+3,000																+3,000			
3.	-3,000																+3,000			
4.	-3,000																+5,000			
5.	-2,400																+2,400			
6.	-2,000																-2,000			
7.	+400																+400			
8.	+8,000																+8,000			
9.	-7,100																-7,100			
10.	-200																-200			
	3,700 +	2,000 +	2,400 +	3,000 +	8,000 =	700 +					400 +	6,000 +	10,000 +	2,000						

Figure 1.3: Transactions Worksheet for January 31, 2015

These numbers are used to prepare the Income Statement.

Transactions in these columns are used to prepare the Statement of Shareholders' Equity.

Column totals are used to prepare the Balance Sheet.

ASSETS = \$19,100

LIABILITIES + EQUITY = \$19,100



# **Recording Transactions in the General Journal**

**Transactions summary:**

1. Issued share capital for \$10,000 cash.
2. Received a bank loan for \$3,000.
3. Purchased equipment for \$3,000 cash.
4. Purchased a truck for \$8,000; paid \$3,000 cash and incurred a bank loan for the balance.
5. Paid \$2,400 for a comprehensive one-year insurance policy effective January 1.
6. Paid \$2,000 cash to reduce the bank loan.
7. Received \$400 as an advance payment for repair services to be provided over the next two months as follows: \$300 for February, \$100 for March.
8. Performed repairs for \$8,000 cash and \$2,000 on credit.
9. Paid a total of \$7,100 for operating expenses incurred during the month; also incurred an expense on account for \$700.
10. Dividends of \$200 were paid in cash to the only shareholder, Bob Baldwin.

**General Journal**

Page #

Date	Description	R	Debit	Credit
2015				
Jan. 1	To record			
2				
	To record			
2				
	To record the purchase of equipment for cash.			

**Transactions summary:**

1. Issued share capital for \$10,000 cash.
2. Received a bank loan for \$3,000.
3. Purchased equipment for \$3,000 cash.
4. Purchased a truck for \$8,000; paid \$3,000 cash and incurred a bank loan for the balance.
5. Paid \$2,400 for a comprehensive one-year insurance policy effective January 1.
6. Paid \$2,000 cash to reduce the bank loan.
7. Received \$400 as an advance payment for repair services to be provided over the next two months as follows: \$300 for February, \$100 for March.
8. Performed repairs for \$8,000 cash and \$2,000 on credit.
9. Paid a total of \$7,100 for operating expenses incurred during the month; also incurred an expense on account for \$700.
10. Dividends of \$200 were paid in cash to the only shareholder, Bob Baldwin.

**General Journal**

Page #

Date	Description	R	Debit	Credit
3				
	To record the purchase of a truck for cash and bank loan.			
5				
	To record payment of a one-year insurance policy.			
10				
	To record payment on bank loan.			
15				
	To record receipt of payment for service not yet performed: \$300 for February, \$100 for March.			

**Transactions summary:**

1. Issued share capital for \$10,000 cash.
2. Received a bank loan for \$3,000.
3. Purchased equipment for \$3,000 cash.
4. Purchased a truck for \$8,000; paid \$3,000 cash and incurred a bank loan for the balance.
5. Paid \$2,400 for a comprehensive one-year insurance policy effective January 1.
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9. Paid a total of \$7,100 for operating expenses incurred during the month; also incurred an expense on account for \$700.
10. Dividends of \$200 were paid in cash to the only shareholder, Bob Baldwin.

**General Journal**

Page #

Date	Description	R	Debit	Credit
31				
	To record repair revenue eared in January.			
31				
	To record expenses incurred and cash payment of exp. in Jan.			
31				
	To record distribution of dividends.			

# RECORDING TRANSACTIONS IN THE GENERAL JOURNAL

This entry tells us to:

- Post \$10,000 to the debit side of the Cash account (increasing Cash by \$10,000), and
- Post \$10,000 to the credit side of the Common stock account (increasing this account by \$10,000).

GENERAL JOURNAL							Page 1
	Date 2015	Description	R	Debit	Credit		
1	Jan. 1	Cash Common Stock To record the issuance of common stock.	101 320	1 0 0 0 0 -	1 0 0 0 0 -		
2		Cash Notes Payable To record receipt of a bank loan.	101 201	3 0 0 0 -	3 0 0 0 -		
3		Equipment Cash To record the purchase of equipment for cash.	183 101	3 0 0 0 -	3 0 0 0 -		

3	Truck	184	8 000	-	
	Notes Payable	201		5 000	-
	Cash	101		3 000	-
	To record the purchase of a tow truck; paid cash and incurred additional bank loan.				
5	Prepaid Insurance	161	2 400	-	
	Cash	101		2 400	-
	To record payment for a one-year insurance policy.				
10	Notes Payable	201	2 000	-	
	Cash	101		2 000	-
	To record payment on bank loan.				
15	Cash	101	4 00	-	
	Unearned Repair Revenue	247		4 00	-
	To record receipt of payment for services not performed: \$300 for February, \$100 for March.				

31	Cash	101	8 000	-		
	Accounts Receivable	110	2 000	-		
	Repair Revenue	450			1 000	00 -
	To record repaid revenue earned in January.					
31	Rent Expense	654	1 600	-		
	Salaries Expense	656	3 500	-		
	Supplies Expense	668	2 000	-		
	Truck Operation Expense	670	700	-		
	Cash	101			7 100	00 -
	Accounts Payable	210			700	-
	To record cash payment of expenses for the month.					
31	Dividends	330	2 00	-		
	Cash	101			2 00	00 -
	To record distribution of dividends.					

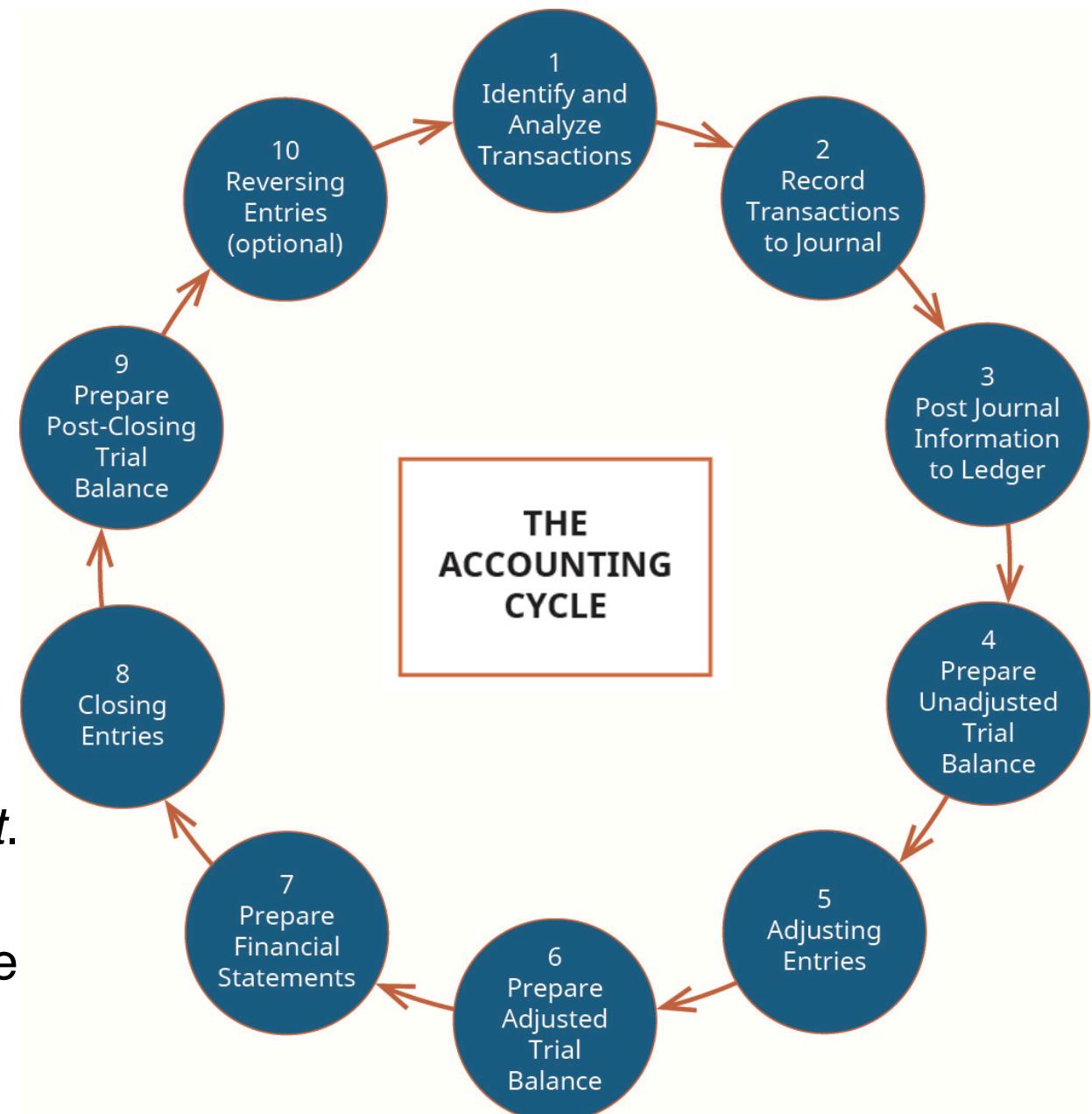
# THE ACCOUNTING CYCLE

## Steps 1 & 2:

- Transactions are analyzed and journalized.
- **Journalizing** consists of analyzing transactions as they occur to see how they affect the accounting equation.
- Then, the transactions are recorded *chronologically* in the **general journal**.

## Step 3:

- Transactions are summarized *by account*.
- **Posting** consists of transferring debits and credits from the general journal to the appropriate **general ledger** accounts.





# **Posting Journal Information to General Ledger**

# ACCOUNTING RECORDS

## ■ Documents

- Source documents
- Product documents
- Turnaround documents

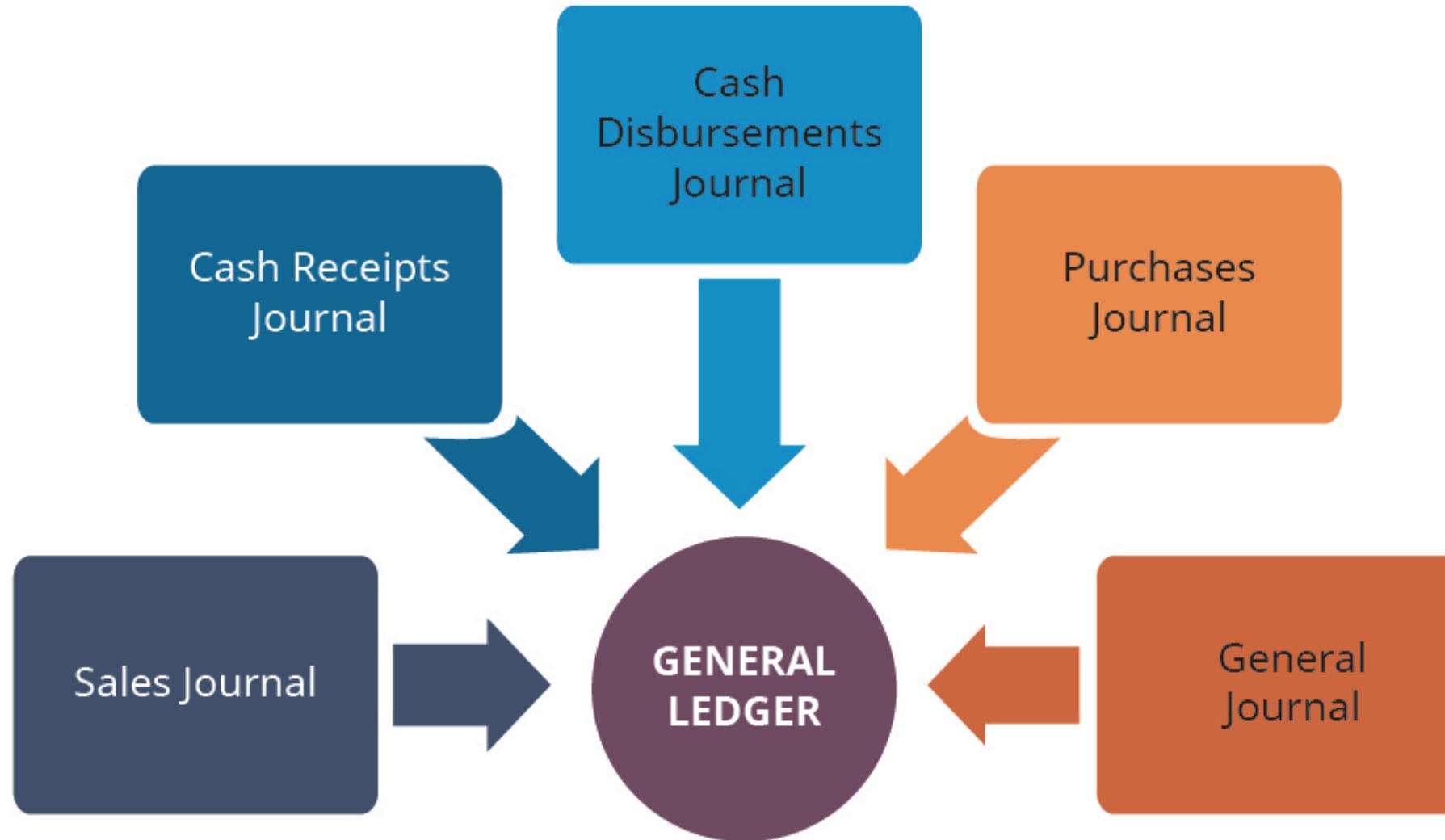
## ■ Journal (chronological records)

- General journal
- Special journal

## ■ Ledger (organized by accounts)

- General ledger
  - A ledger that contains summary-level data for every asset, liability, equity, revenue, and expense account of the organization.
  - Examples: AR, AP
- Subsidiary ledger
  - A ledger used to record detailed data for a general ledger account with many individual subaccounts
  - Breaks down certain general ledger accounts to provide more detailed information to users

Transaction summaries from the special journals, and all transactions in the general journal are posted to the general ledger



# General Ledger in T-account Form

# EXAMPLE 1

## Record Transaction and Post Information to T-accounts

- Prepare journal entries to record the following transactions. Create a T-account for Cash, post any entries that affect the account, and calculate the ending balance for the account. Assume a Cash beginning balance of \$37,400.
  - A. May 12, collected balance due from customers on account, \$16,000
  - B. June 10, purchased supplies for cash, \$4,400

Date	Description	Debit	Credit

Cash	

## **EXAMPLE 2**

### **RECORD TRANSACTION AND POST INFORMATION TO T-ACCOUNTS**

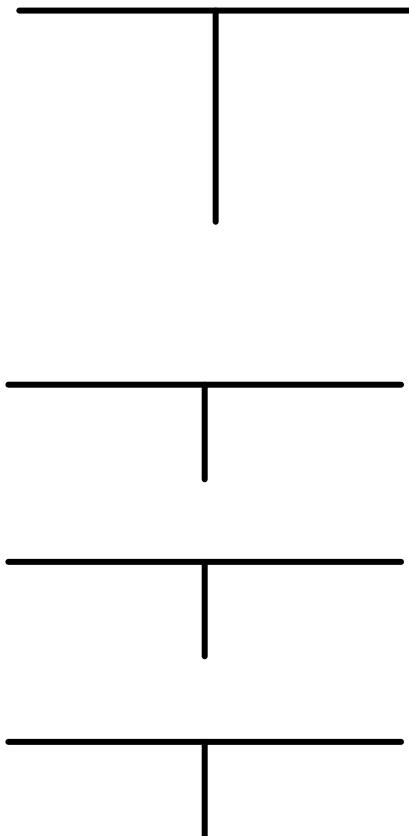
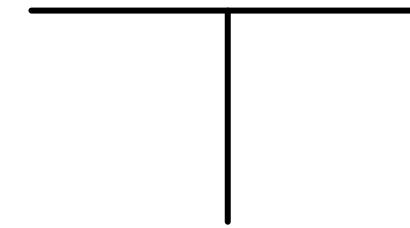
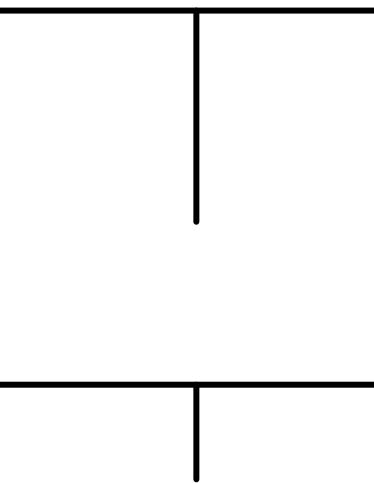
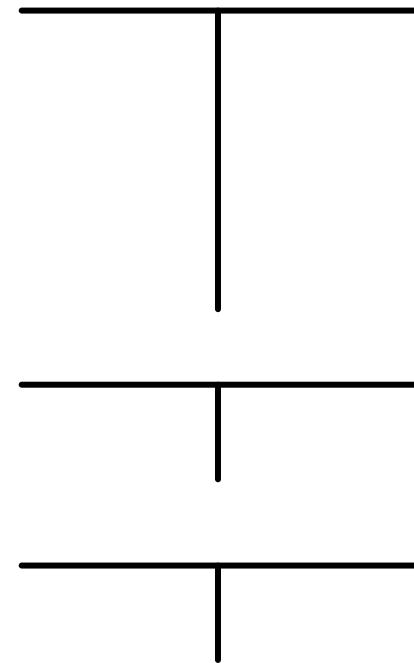
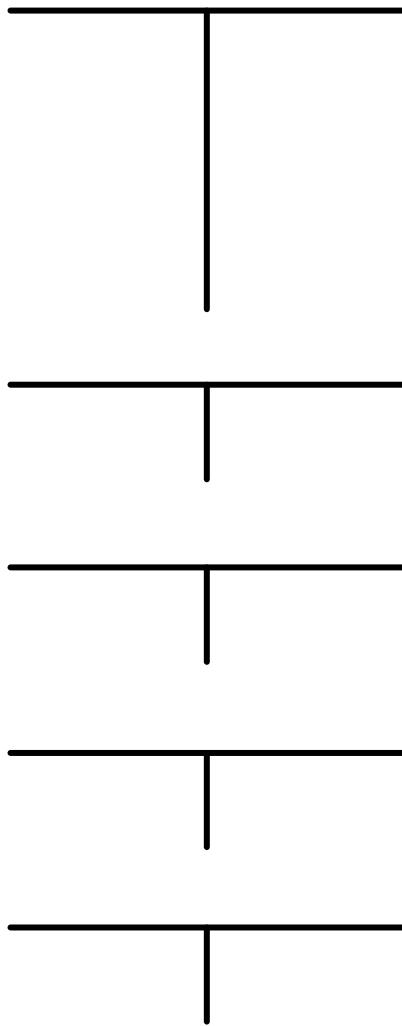
- Prepare journal entries to record the following transactions. Create a T-account for Accounts Receivable and Cash, post any entries that affect the account, and calculate the ending balance for the account (assume no beginning balance).
    - A. Provided legal services to customers for cash, \$5,600
    - B. Provided legal services to customers on account, \$4,700
    - C. Collected cash from customer accounts, \$3,500

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## **Transactions summary:**

1. Issued share capital for \$10,000 cash.
2. Received a bank loan for \$3,000.
3. Purchased equipment for \$3,000 cash.
4. Purchased a truck for \$8,000; paid \$3,000 cash and incurred a bank loan for the balance.
5. Paid \$2,400 for a comprehensive one-year insurance policy effective January 1.
6. Paid \$2,000 cash to reduce the bank loan.
7. Received \$400 as an advance payment for repair services to be provided over the next two months as follows: \$300 for February, \$100 for March.
8. Performed repairs for \$8,000 cash and \$2,000 on credit.
9. Paid a total of \$7,100 for operating expenses incurred during the month; also incurred an expense on account for \$700.
10. Dividends of \$200 were paid in cash to the only shareholder, Bob Baldwin.

**ASSETS****LIABILITIES****EQUITY****REVENUE****EXPENSES**

# RECORDING TRANSACTIONS IN THE GENERAL JOURNAL

This entry tells us to:

- Post \$10,000 to the debit side of the Cash account (increasing Cash by \$10,000), and
- Post \$10,000 to the credit side of the Common stock account (increasing this account by \$10,000).

GENERAL JOURNAL							Page 1
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2		Cash Notes Payable To record receipt of a bank loan.	101 201	3 0 0 0 -	3 0 0 0 -		
3		Equipment Cash To record the purchase of equipment for cash.	183 101	3 0 0 0 -	3 0 0 0 -		

3	Truck	184	8 000	-	
	Notes Payable	201		5 000	-
	Cash	101		3 000	-
	To record the purchase of a tow truck; paid cash and incurred additional bank loan.				
5	Prepaid Insurance	161	2 400	-	
	Cash	101		2 400	-
	To record payment for a one-year insurance policy.				
10	Notes Payable	201	2 000	-	
	Cash	101		2 000	-
	To record payment on bank loan.				
15	Cash	101	4 00	-	
	Unearned Repair Revenue	247		4 00	-
	To record receipt of payment for services not performed: \$300 for February, \$100 for March.				

31	Cash	101	8 000	-	
	Accounts Receivable	110	2 000	-	
	Repair Revenue	450			1 000 00 -
	To record repaid revenue earned in January.				
31	Rent Expense	654	1 600	-	
	Salaries Expense	656	3 500	-	
	Supplies Expense	668	2 000	-	
	Truck Operation Expense	670	700	-	
	Cash	101			7 100 -
	Accounts Payable	210			700 -
	To record cash payment of expenses for the month.				
31	Dividends	330	2 00	-	
	Cash	101			2 00 -
	To record distribution of dividends.				

# Cash

## Bank Loan (Notes Payable)

## **TRANSACTIONS POSTED TO TWO ACCOUNTS IN THE GENERAL LEDGER (FORMAL VARIATION OF THE T-ACCOUNT)**

The journal records each financial transaction in double-entry form. Each side of the entry is transferred to a separate ledger account.

The ledger stores transactions according to account and keeps a running total of each account balance.

# THE ACCOUNTING CYCLE

## Steps 1 & 2:

- Transactions are analyzed and journalized.
- **Journalizing** consists of analyzing transactions as they occur to see how they affect the accounting equation.
- Then, the transactions are recorded *chronologically* in the **general journal**.

## Step 3:

- Transactions are summarized *by account*.
- **Posting** consists of transferring debits and credits from the general journal to the appropriate **general ledger** accounts.

## Step 4:

- Prepare unadjusted trial balance



# PREPARE UNADJUSTED TRIAL BALANCE

- Purpose: start of financial statements preparation
- Purpose: help prove the accounting equation is in balance
- The account balances in the \_\_\_\_\_ are used to prepare the trial balance.
- The trial balance is an internal report that lists all the account balances \_\_\_\_\_.  
The total debits must equal total credits on the trial balance.
- The (adjusted) trial balance is used in the preparation of financial statements.



## EXAMPLE 3

### PREPARE AN UNADJUSTED TRIAL BALANCE

- Prepare an unadjusted trial balance, in correct format, from the alphabetized account information from the ledger accounts summarized as follows. Assume all accounts have normal balances.

Accounts payable	\$ 8,005
Accounts receivable	12,500
Cash	56,015
Common stock	28,000
Fees earned revenue	75,510
Operating expense	43,000

Account	Debit	Credit
Total		

**Transactions summary:**

1. Issued share capital for \$10,000 cash.
2. Received a bank loan for \$3,000.
3. Purchased equipment for \$3,000 cash.
4. Purchased a truck for \$8,000; paid \$3,000 cash and incurred a bank loan for the balance.
5. Paid \$2,400 for a comprehensive one-year insurance policy effective January 1.
6. Paid \$2,000 cash to reduce the bank loan.
7. Received \$400 as an advance payment for repair services to be provided over the next two months as follows: \$300 for February, \$100 for March.
8. Performed repairs for \$8,000 cash and \$2,000 on credit.
9. Paid a total of \$7,100 for operating expenses incurred during the month; also incurred an expense on account for \$700.
10. Dividends of \$200 were paid in cash to the only shareholder, Bob Baldwin.

Big Dog Carworks Corp.  
Unadjusted Trial Balance  
At January 31, 2015

<i>Acct.</i>	<i>Account</i>	<i>Debit</i>	<i>Credit</i>
101	Cash	\$3,700	
110.	Accounts receivable	2,000	
161	Prepaid insurance	2,400	
183	Equipment	3,000	
184.	Truck	8,000	
201	Bank loan		\$6,000
210	Accounts payable		700
247	Unearned revenue		400
320	Share capital		10,000
330	Dividends	200	
450	Repair revenue		10,000
654	Rent expense	1,600	
656	Salaries expense	3,500	
668	Supplies expense	2,000	
670	Truck operation expense	<u>700</u>	
		\$27,100	\$27,100

# SUMMARY

- Companies record transactions in a \_\_\_\_\_, a document which *chronologically* lists each debit and credit journal entry.
- To summarize the debit and credit entries *by account*, the entries in the general journal are posted (or transferred) to the \_\_\_\_\_.
- To help prove the accounting equation is in balance, a trial balance is prepared.
  - The account balances in the general ledger are used to prepare the trial balance.
  - The trial balance is an internal report that lists all the account balances **at a point in time**.
  - The total debits must **equal** total credits





**Thank you!  
Questions?**