

Topic: Business Data Processing in Computer Application



CLASS: BA-VI SEM

SUBJECT: COMP. APPL.(VOCATIONAL)

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What is data processing?



**DATA PROCESSING
OCCURS WHEN DATA IS
COLLECTED AND
TRANSLATED INTO
USABLE INFORMATION.**

Data Processing



Usually performed by a data scientist or team of data scientists, it is important for data processing to be done correctly as not to negatively affect the end product, or data output. When data is properly stored, it can be quickly and easily accessed by members of the organization when needed.

Six stages of data processing

1. Data collection

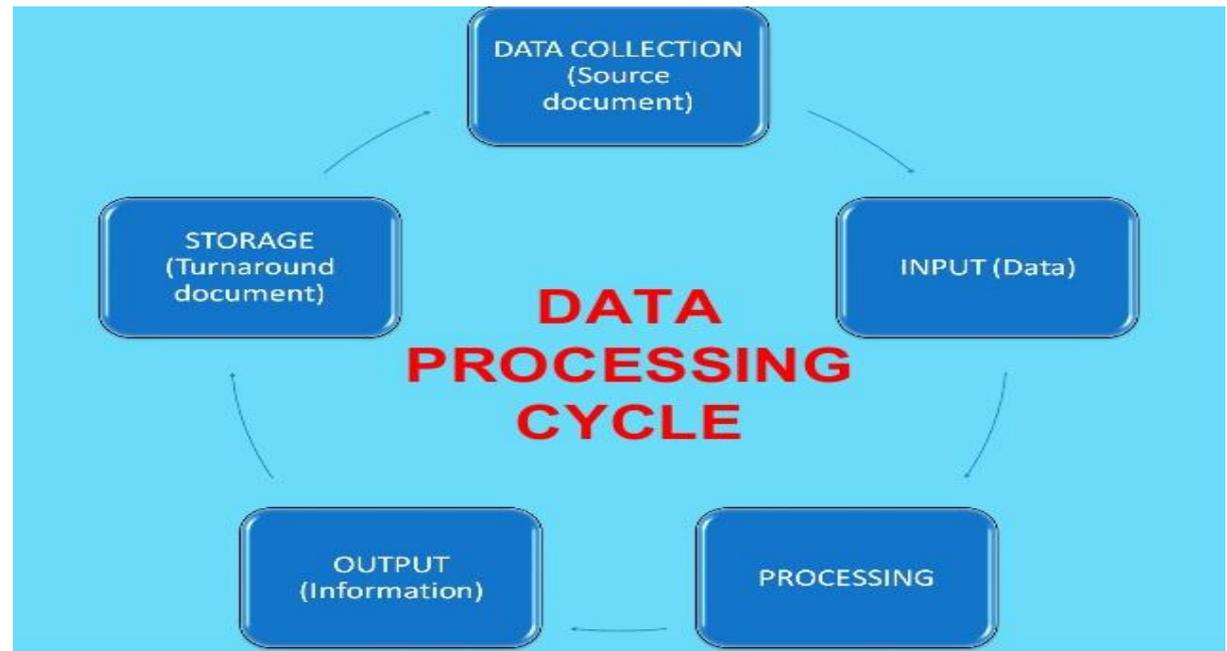
Collecting data is the first step in data processing. Data is pulled from available sources, including data lakes and data warehouses.

2. Data preparation

Once the data is collected, it then enters the data preparation stage. Data preparation, often referred to as “pre-processing” is the stage at which raw data is cleaned up and organized for the following stage of data processing. During preparation, raw data is diligently checked for any errors. The purpose of this step is to eliminate bad data and begin to create high-quality data for the best business intelligence.

3. Data input

The clean data is then entered into its destination, and translated into a language that it can understand. Data input is the first stage in which raw data begins to take the form of usable information.



4. Processing

During this stage, the data inputted to the computer in the previous stage is actually processed for interpretation.

5. Data output/interpretation

The output/interpretation stage is the stage at which data is finally usable to non-data scientists. It is translated, readable, and often in the form of graphs, videos, images, plain text, etc.

6. Data storage

The final stage of data processing is storage. After all of the data is processed, it is then stored for future use. When data is properly stored, it can be quickly and easily accessed by members of the organization when needed.

Define Payroll System ?

A **payroll system** calculates the amount you owe your employees based on factors such as the time they worked, their hourly wages or salaries, and whether they took vacation or holiday time during the pay period.

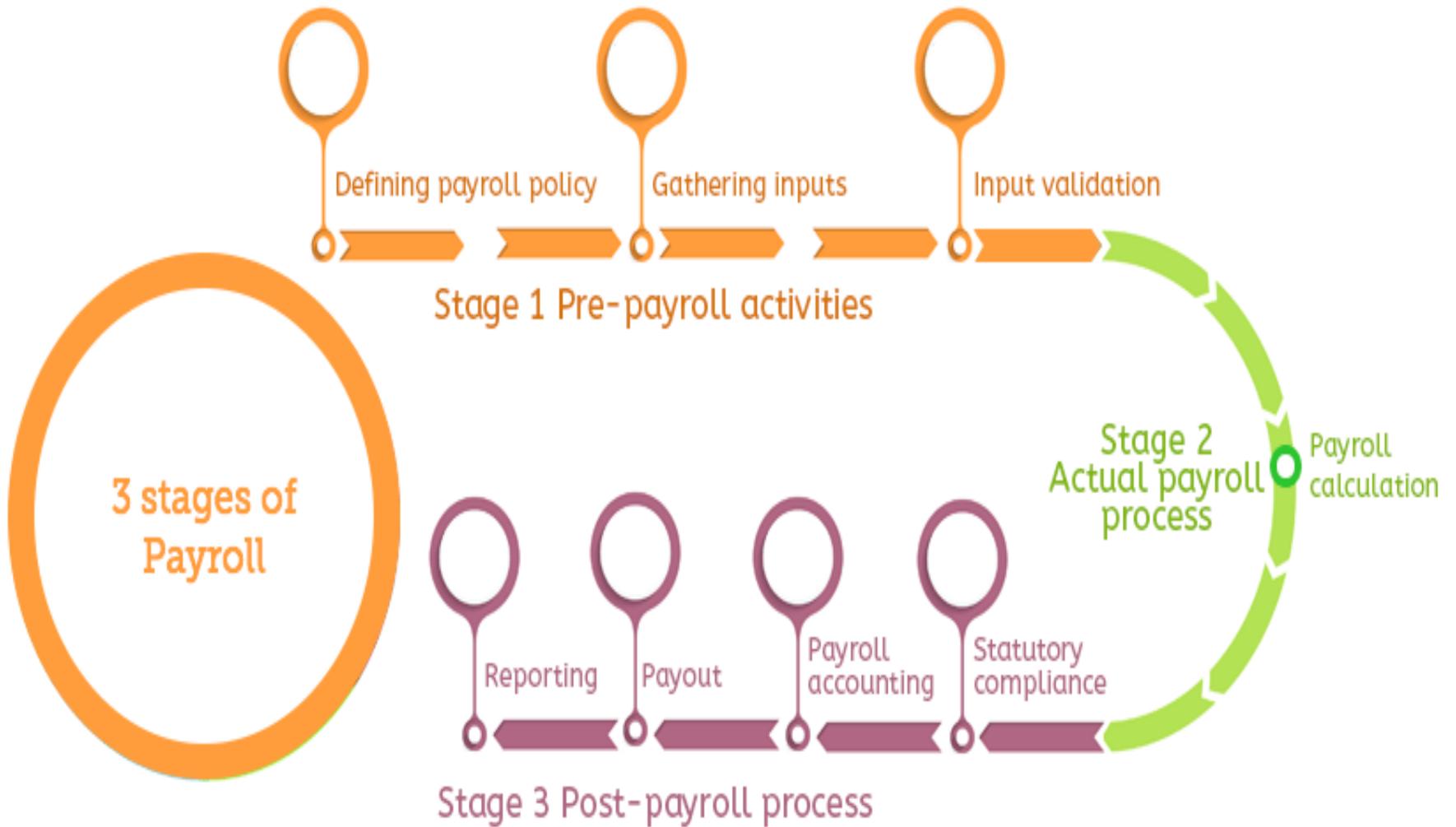
Meaning of Payroll System?

If your business has one or more employees, you should have a payroll system in place. An automatic payroll process helps you comply with legal and tax requirements and simplifies the process of paying your employees. Many employers outsource the payroll function to an outside vendor or use payroll system software instead of relying on manual processes.

What Is the Payroll Process?

A payroll administrator needs to do detailed planning of the whole payroll process. There is always work managing ongoing tasks that need attention and constant monitoring of changes to tax withholding, contribution and other things to consider in the process.

The payroll process can be split into three stages — pre-payroll, actual payroll and post payroll activities.



PRE-PAYROLL ACTIVITIES

Defining policy: In these beginning stages, it is important to establish a company's policies such as a pay policy, leave and benefits policy and attendance policy.

Ensure that these policies are well-defined and signed off by your company's management so that standard payroll processing can be established.

Gathering input data:

Interacting with multiple departments and payroll is often an integral part of the payroll process. These are the people who can give you more access to important information like mid-year salary revisions and attendance data.

The process might be more consolidated in smaller organizations and more robust in larger companies. Gathering this data can be overwhelming but payroll software has integrated features like leave and attendance management and employee self-service portals to make the job easier

Input validation:

The next step in the process is checking the validity of the input data and whether it adheres to company policy. This is the time to make sure no active employee has been missed and no inactive employee has been included in salary payment.

ACTUAL PAYROLL PROCESS

Payroll calculation: This is the stage in the payroll process where input data is put into the payroll system to actually process the payroll. This process results in net pay being generated after adjusting necessary taxes and deductions.

After this process is complete, it is best practice to reconcile the values and verify accuracy to avoid errors.

POST-PAYROLL PROCESS

Statutory compliance: At the time of processing all statutory deductions like EPF (Employee Provident Fund), TDS (Tax Deduction at Source) and ESI (Employee State Insurance) are deducted. The payroll administrator then sends the amount to the appropriate government agencies.

The frequency of this process can vary depending on the dues. Most of these fees can be made through specific forms set in place.

After all the dues are paid, return reports are

Payroll accounting: It is important that every organization keep a record of all its financial transactions for the payroll process.

Salaries are one of the most vital parts of operating costs to be recorded in your book of accounts. Payroll management should always ensure that all salary and reimbursement data is accurately entered into the company's accounting or ERP (Enterprise Resource Planning) system.

Payout: Salaries can be paid out by cash, check or bank transfer. Typically, employers deposit salaries directly into an employee's bank account.

Once payroll is processed, a company needs to ensure their bank account has enough funds to make salary payments.

The next step is getting a salary bank advice statement to the company's branch.

This statement includes details like employee id, bank account number and amount of wages.

Reporting:

After you've completed payroll for a particular month, your finance department or management team might ask for a report on things like department employee costs or location employee costs.

A payroll administrator will need to gather the data and extract the required information to share these reports.

6 Reasons Payroll Systems Are Important

- Payroll is an integral part of a company's operations. Not only is it responsible for employees' salary compensation but it also plays an important role in protecting a company by ensuring it is following compliance with tax legislation.

Here are other reasons payroll systems are so important:

1) EMPLOYEE MORALE

- An important part of keeping employees happy is paying them on time.
- Ensuring that you have a payroll system that pays your company in a timely manner on a consistent basis will definitely impact your employee morale. Late and inaccurate payment is likely to cause your employees to question the financial stability of the company. This might affect the overall environment and culture of your company, resulting in a negative attitude from employees that could bleed into their day-to-day tasks and cause underperformance.

2) COMPENSATION

- Payroll goes beyond an employee's salary.
- An employee's compensation can also include bonuses and benefits on top of their salary. Bonuses and salary increases associated through performance evaluations are also managed through the payroll system.

3) REPUTATION

- Not only does a company have a financial obligation to their employees, but they must also ensure that its payroll activities are compliant with the country's tax and employment legislation.
- Following legislative laws and efficiently meeting tax obligation establishes a company as a stable employer. This boost to a company's reputation will ultimately attract and retain a solid pool of talent.

4) GOVERNMENT REPORTING

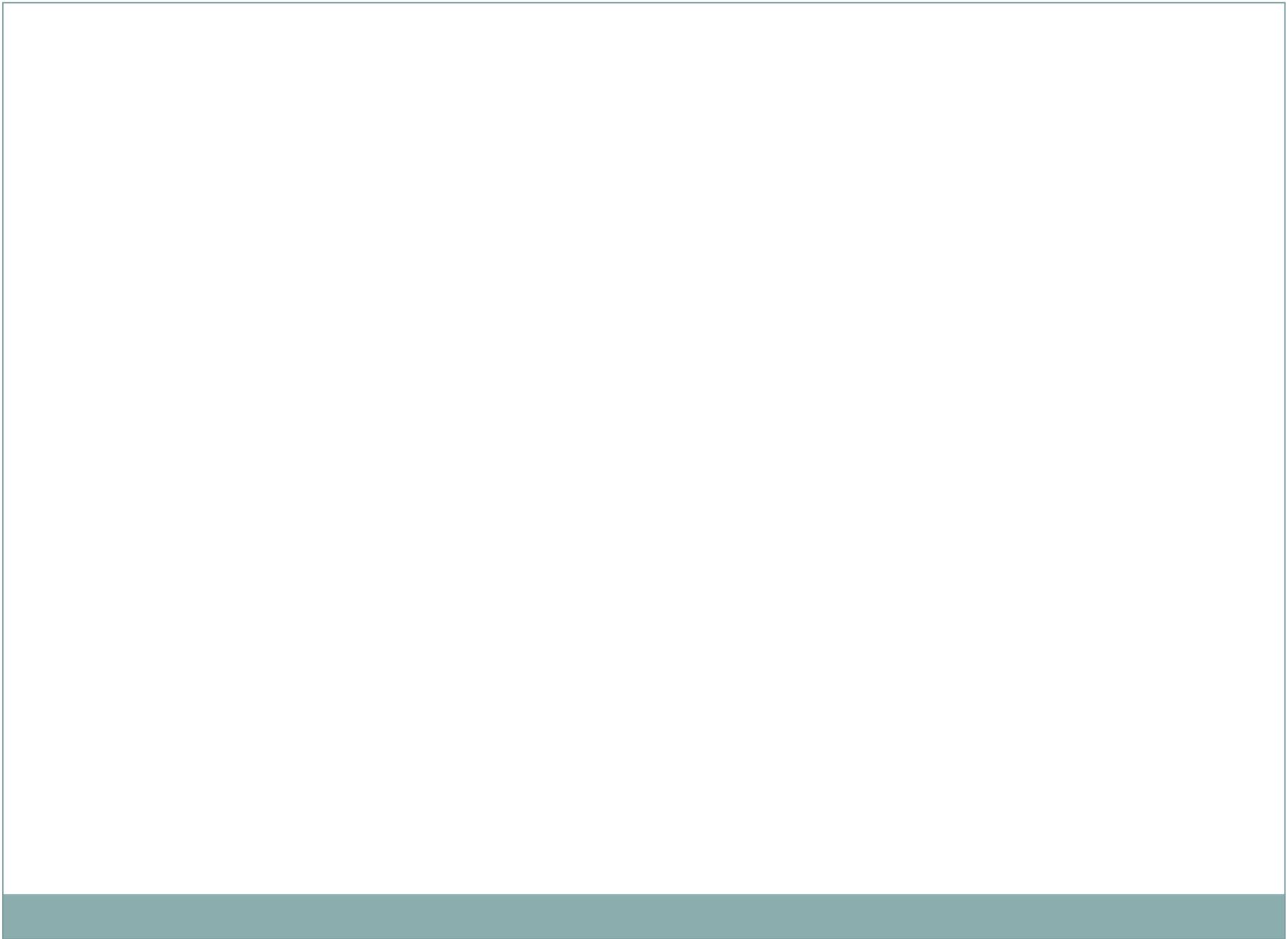
- A payroll system helps companies comply with tax and employment legislation.
- A company needs to report their payroll tax withholdings, payments and employee statuses to local, state and federal governments on a quarterly or annual basis. Your company's requirements often depend on the size of your payroll and the type of business you are running.

5) FOLLOWING LABOR LAWS

- Understanding labor compliance is another way to make sure your company has happy employees and is following local and federal laws.
- Each state has different labor laws regarding minimum wage, overtime, labor law posters, termination procedures and more. Payroll systems and payroll administrators make those rules easier to follow and understand.

6) PAYING TAXES

- To follow state and federal tax laws, company's need to withhold income and payroll taxes from an employee's payroll and pay those taxes on time.
- Employers often cover the costs of employees benefits and a portion of that might come from an employee's gross wage. A company's payroll system also needs to deduct Social Security and Medicare payments from an employee's gross wages. On most payrolls, an employer's payroll system will withhold federal and state income taxes from an employee's payroll.



Thank You