

## Human Resource Planning

Human resource planning (HRP) is the first step in the HRM process. HRP is the process by which an organization ensures that it has the right number and kind of people, at the right place, at the right time, capable of effectively and efficiently completing those tasks that will help the organization achieve its overall objectives.

HRP translates the organization's objectives and plans into the number of workers needed to meet those objectives. The actual HRM process starts with the estimation of the number and kind of people required by the organization for the coming period.

HRP is also known by other names such as 'Manpower Planning', 'Employment Planning', 'Labour Planning', 'Personnel Planning', etc. HRP is a sub-system in the total organizational planning. In other words, HRP is derived from the organizational planning just like production planning, sales planning, material planning, etc.

In Short -

1. HRP – process – tries to ensure – right people, at right place, and at right time.
2. Determination of future need of HR as per Org. planning and structure.
3. HR availability – future period
4. Getting the right number of qualified people into the right job is the crux of the problem here.

The following points highlight the need and importance of HRP in the organizations:

### **I. Assessing Future Personnel Needs:**

Whether it is surplus labour or labour shortage, it gives a picture of defective planning or absence of planning in an organization. A number of organizations, especially public sector units (PSUs) in India are facing the problem of surplus labour.

It is the result of surplus labour that the companies later on offer schemes like Voluntary Retirement Scheme (VRS) to eliminate

surplus staff. Thus, it is better to plan well about employees in advance. Through HRP, one can ensure the employment of proper number and type of personnel.

## **II. Foundation for Other HRM Functions:**

HRP is the first step in all HRM functions. So, HRP provides the essential information needed for the other HRM functions like recruitment, selection, training and development, promotion, etc.

## **III. Coping with Change:**

Changes in the business environment like competition, technology, government guidelines, global market, etc. bring changes in the nature of the job. This means changes in the demand of personnel, content of job, qualification and experience needed. HRP helps the organization in adjusting to new changes.

## **IV. Providing base for developing talents**

Jobs are becoming more and more knowledge oriented. This has resulted in changed profile of manpower. Because of increasing emphasis on knowledge, there is shortage of certain category of personnel and there are frequent movement of personnel from one organization to another. The replacement cost is also very high. Therefore, an organization must be ready to face such an eventuality by taking proper HR planning.

## **V. Conformity with Government Guidelines:**

In order to protect the weaker sections of the society, the Indian Government has prescribed some norms for organizations to follow. For example, reservations for SC/ST, BC, physically handicapped, ex-servicemen, etc. in the jobs. While planning for fresh candidates, HR manager takes into consideration all the Government guidelines.

## **VI. International Expansion Strategies:**

International expansion strategies of an organization depend upon HRP. Under International Human Resource Management (IHRM), HRP becomes more challenging. An organization may want to fill the foreign subsidiary's key positions from its home country

employees or from host-country or from a third country. All this demands very effective HRP.

## **VII. Having Highly Talented Manpower Inventory:**

Due to changing business environment, jobs have become more challenging and there is an increasing need for dynamic and ambitious employees to fill the positions. Efficient HRP is needed for attracting and retaining well qualified, highly skilled and talented employees.

### **Human Resource Planning – Objectives:**

The main objectives of HRP are:

- (i) Proper assessment of human resources needs in future.
- (ii) Anticipation of deficient or surplus manpower and taking the corrective action.
- (iii) To create a highly talented workforce in the organization.
- (iv) To protect the weaker sections of the society.
- (v) To manage the challenges in the organization due to modernization, restructuring and re-engineering.
- (vi) To facilitate the realization of the organization's objectives by providing right number and types of personnel.
- (vii) To reduce the costs associated with personnel by proper planning.
- (viii) To determine the future skill requirements of the organization.
- (ix) To plan careers for individual employee.
- (x) Providing a better view of HR dimensions to top management.
- (xi) Determining the training and development needs of employees.

### **Responsibility for HRP**

Formulation of HR plans is a shared task between top management, line managers and HR Department.

Every line manager is responsible for planning manpower of the respective department and the top management is responsible for

the planning of resources for the entire organization. The personnel department supplies relevant information and data to all the line managers and helps those regarding interdepartmental transfers, promotions, demotions etc. Personnel department also helps in using the techniques and forecasting the manpower.

Top Management shares the responsibility of approving HR plans and creating climate for undertaking systematic HR planning. Functional managers under whom people work, they provide useful inputs which are used in the formulation of HR plans. Ultimately, these managers are responsible for the effective utilization of human resource and, therefore, they must know what kind of personnel they need.

Personnel department forecasts internal mobility surplus or deficit of human resources for the entire organisation, prepares action plans regarding redeployment, redundancy, employment, development and internal mobility and submits plans to the management at the top which either by its own or by appointing a committee reviews departmental plans and overall plans, make necessary adjustments and finalises the plans. Personnel department in its turn prepares modified plans for the departments based on finalised overall plan and communicates them to respective heads of department.

### **Human Resource Planning Process.**

1. Organisational Objectives, Plans and policies.
2. Human Resource Planning
  - Forecasting need for human resource
  - Forecasting supply of human resource
3. Identification of human resource gap
  - Surplus human resource
  - Shortage of human resource
4. Action plans for bridging gap

## ❖ **Technique for forecasting human resource need**

1. Managerial Judgement Method
2. Delphi Technique
3. Works study technique
4. Ratio trend analysis
5. Statistical and Mathematical models

### **1. Managerial Judgement Method**

In this method the managers prepare the forecast of human resource needs of various categories in their own department based on their past experience. In this method, the experts in a particular field are requested to give their estimated manpower requirements for future and then aggregated for the whole organization. Generally small or medium size organization adopt this method.

### **2. Delphi Technique**

Named after the ancient Greek Oracle at the city of Delphi. This is a group decision by experts in which the individual experts act separately. The HR experts act as intermediaries and summarise the views of various experts and an attempt is made to arrive at consensus.

If the views of the experts differ significantly, then the individual experts are fed with the views of other experts in areas where there is distinct difference and they are asked to further analyze the problem and to revise their views in the light of views of the other experts in the group. The process can be repeated till a near coincidence of views are achieved. This method seems to be more accurate and less expensive than the traditional face-to-face interaction and the experts are free to express their views.

### **3. Works study technique**

This method is useful where the volume of work can be quantified. The number of man hour required to produce each unit is carefully

calculated then to calculate the number of persons required with reference to a planned output after giving due weight-age to absenteeism, rest, idle time, and ability of person.

For example:

(i) Planned output for year 2006 – 07 = 50000 units

(ii) Standard time required to produce one unit = 2 hours

(iii) Total planned hours required to produced 50000 units = 50000  
 $\times 2 = 100000$  hours

(iv) Productive hours per person per year = 2000 hours

(v) Number of workers required =  $100000/2000 = 50$  workers

(vi) If span of control in the unit is 10 per officer, then 5 officers are also required.

This method is particularly suitable for production line work and short-term estimates. A study of past trends may serve as a useful guide in this regard.

#### **4. Ratio trend analysis**

Under this method ratio is calculated on the basis of past data. Future ratios are calculated on the basis of time series analysis, after making changes in organisation, methods and jobs. Moving average and exponential smoothing can be used for projection. On the basis of establishment ratios, the demand for human resource is estimated.

Work study method is more appropriate for repetitive and manual jobs when it is possible to measure work and standards. Job methods should not change frequently.

Under the trend analysis method, HR needs can be estimated by analysing the past trends and projecting future demand by extrapolating the trend. The basic assumption of trend analysis is that in future all the factors that were responsible for the past movements will be present and will exert influence in the same way

as had been in the past. The relationship is often expressed in the form of a mathematical formula.

## 5. Statistical and Mathematical models

It expresses the relationship between dependent variables and independent variables. Various factors influencing manpower needs can be expressed by different types of models such as regressions, optimization model etc. These are appropriate for large organizations.

In other words, various factors influencing manpower needs are expressed in the form of a formula. Several types of models can be used. These are complex and appropriate only for large organizations.

### (a) Econometric Models:

Econometric models are built up on the basis of analysis of past statistical data establishing the relationship between variables in a mathematical formula. The variables are those factors such as production, sales, finance and other activities affecting human resource requirement. Econometric model is used to forecast human resource requirements based on various variables.

### (b) Bureks Smith Model:

Elmer Bureks and Robert Smith have developed a mathematical model for human resource forecasting based on some key variables that affects overall requirement for human resources of the organisation. They have given an equation.

$$E_n = (L_{agg} + G) \frac{1}{x} / y$$

Where  $E_n$  = Estimated level of demand for employees

$L_{agg}$  = Turnover or overall current business activity

$G$  = Total growth in business activity anticipated thought period 'n' in term of rupees

$x$  = Average productivity improvement from today thought planning period.

$y$  = Conversion figure relating today's overall activity to required employees.

This method is used when the values of  $G$ ,  $x$  and  $y$  are accurate. To obtain the values of  $G$ ,  $x$  and  $y$  different statistical techniques are used.

### **(c) Regression Analysis:**

Regression analysis is used to forecast demand for human resources at some point of time in future by using factors such as sales, production services provided etc. This method is used when independent and dependent variables are functionally related to each other. Nowadays computers are used to solve regression equations for demand forecasting.

#### **❖ Forecasting of Human Resource Supply**

After forecasting HR needs, it is logical to determine how these needs can be met. Newly established organization all personnel that are needed have to be procured from outside. However, in ongoing organization, there are existing personnel who may be a source of supply to fill those needs.

Here our focus will be on internal source of supply of human resource and outside sources of supply will be taken later (Recruitment and Selection).

In assessing the availability of human resource from internal sources, following two models are undertaken:

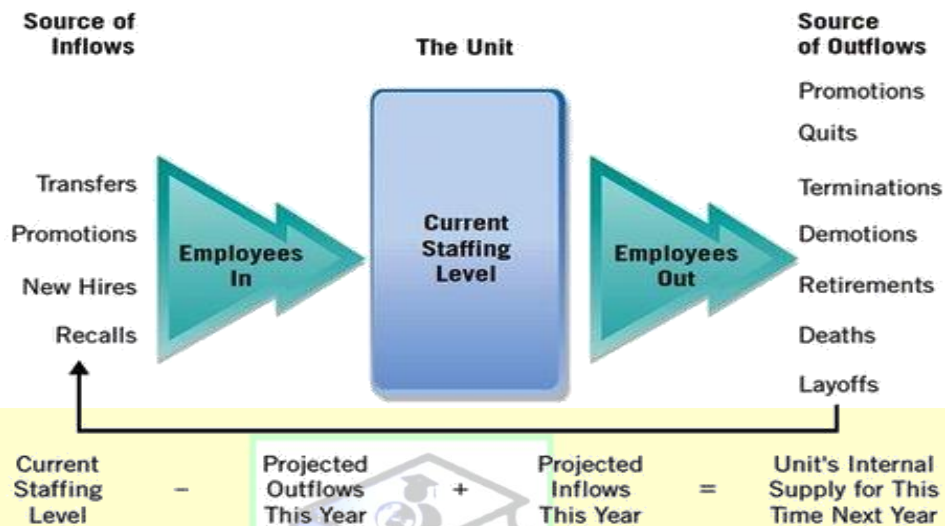
1. Human Resource Flow Model
2. Human Resource Inventory

#### **1. Human Resource Flow Model**

Internal supply of human resource available by way of transfers, promotions, retired employees & recall of laid-off employees, etc. An organisation can be considered as a system of flows-both inflows and outflows of various resources. Based on this concept, a flow model of human resources has been developed which is known as



**Markov chain analysis** model or simply as **Markovian model**. This can be applied for organisation as a whole or any of its subsystems. The basic assumption of this model, and which is true, is that in a system, there are inflows and outflows of personnel during a period in our case the HR plan period.



## 2. Human Resource Inventory

Total human resources of an organisation are classified as managerial and non-managerial, skills inventory is related to non-managerial personnel and management inventory is related to managerial personnel. Whatever names are used, an inventory catalogue a person's skills, abilities, and potential. The process of preparing human resource inventory involves four steps: determination of personnel whose inventory is to be prepared, cataloguing of factual information of each individual, systematic and detailed appraisal of these individuals, and detailed study of those individuals who have potential for development. Since non-managerial personnel differ from managerial personnel, different types of information are required for preparing their inventories

**Skills Inventory** - Usually, in a skills inventory, following types of information are included:

1. Employee personal data:
2. Skills-education, job experience, training, etc.:
3. Special achievements, If any:
4. salary and job history, and
5. Potentials of the employee.

**Management Inventory.** A management inventory includes following information:

1. Personal data;
2. Work history;
3. Strengths and weaknesses;
4. Career plan;
5. Promotion potentials;
6. Number and types of employees managed
7. Total budgets managed, and
8. Any special achievements such as acquisition of additional degrees, papers presented. conferences attended, etc.

The information mentioned above is maintained by human resource information system (HRIS). However, there should be periodic review and updation of the information. Human resource inventory provides information about present and future personnel being available to the organization.

### **Identification of Human Resource Gap**

Human resource gap is the difference between human resources required at a particular point of time and the human resources being available at that particular time. This gap can be identified on the basis of forecasts for human resource needs and supply. This gap may be of two types: **surplus human resources** and **shortage of human resources**. Based on the analysis of this gap, action plans must be developed to overcome this gap, Action plans that are required to deal with surplus human resources include separation of such personnel in various ways over the period of time such as voluntary retirement scheme, layoff, reduced work hours, etc as the case may be and as permitted by legal requirements. Shortage of human resources can be overcome by making additional recruitment and selection developing personnel, and motivating and integrating them with the organisation.

## Human Resource Utilisation Analysis (HRUA)

For each job or Job group, HR utilisation analysis shows how human resources are being used. This analysis may produce three outcomes

**1. Underutilisation** - Underutilisation is the situation in which the abilities of existing human resources are not utilised fully either because of lack of adequate amount of job or faulty human resource utilisation plan. By analysing the causes of human resource underutilisation an organisation can overcome those causes and can reduce human resource cost.

**2. Parity** - Parity of human resource utilisation is the situation in which the abilities of existing human resources are utilised fully. In such a situation, the organisation can go for further course of action for bridging the gap between human resources needed and human resources available

**3. Overutilisation** - Overutilisation is the situation in which the abilities of human resources are utilised beyond the required level. While this may be beneficial to the organisation in the short term because of lower employee cost per unit of production, it may be dysfunctional in the long term because of employee burnout and, subsequent, withdrawal from the organisation.

**REGISTRATION OPEN**  
ONLINE/ OFFLINE BATCH  
Prayagraj (Allahabad)

**UGC NET/ JRF**  
Commerce  
Management  
HRM

**Ph.D./ D.Phil.**  
Admission Guidance

**JOIN**

**Commerce Whiz**

India's specialised coaching institute for  
UGC NET/ JRF & RESEARCH GUIDANCE  
Commerce, Management & HRM



# Commerce Whiz