Available in online @ www.iaraindia.com
RESEARCH EXPLORER-International Journal on Economics and Business Management
ISSN: 2250-1940 (P) 2349-1647 (O)
Impact Factor: 8.276 (12OR), 3.676 (COSMOS)
Volume XV, Issue 52
July - September 2026
Formally UGC Approved Journal (63185), © Author

AN EMPIRICAL STUDY ON MANPOWER PLANNING PRACTICES AND EMPLOYEE PERFORMANCE IN SPINNING MILLS IN DINDIGUL DISTRICT

Mrs. R. SUGANTHI
Ph.D Part-Time Research Scholar
PG & Research Department of Commerce
Sengamala Thayar Trust Women's College
(Affiliated to Bharathidasan University)
Mannargudi.

Dr. D. SUPULAKSHMI
Research Advisor
Guest Lecturer in Commerce
Government Arts and Science College
(Affiliated to Bharathidasan University)
Karambakkudi, Pudukkottai District

Dr. B. KAYATHIRIBAI
Head & Assistant Professor
PG & Research Department of Commerce
Sengamala Thayar Trust Women's College
(Affiliated to Bharathidasan University)
Mannargudi

ABSTRACT

Manpower planning plays an important role in ensuring that organisations have the right number of employees with appropriate skills at the right time. This study examines manpower planning practices and employee performance in spinning mills in Dindigul District. The study specifically focuses on five dimensions of manpower planning: manpower forecasting, recruitment and selection planning, employee deployment and utilisation, training and development planning, and retention and succession planning. A descriptive and analytical research design was adopted, and primary data were collected from 145 employees using a structured questionnaire. Frequency and percentage analysis, one-way ANOVA, Pearson's correlation and multiple regression analysis were employed to analyse the data. The findings indicate that employees generally perceive manpower planning practices and their own performance favourably. Significant differences in perceptions of manpower planning were observed based on age, work experience, monthly income, job category and department, while educational qualification, marital status and type of employment showed no significant differences. Pearson's correlation revealed a strong positive relationship between manpower planning practices and employee performance ($r = 0.782$, $p < 0.001$). Regression analysis further established that all five

manpower planning dimensions made significant positive contributions to employee performance. Training and development planning emerged as the strongest predictor (β = 0.291). The overall model was statistically significant and explained 50.7% of the variance in employee performance. The study concludes that systematic manpower planning can provide a strong foundation for enhancing employee effectiveness in spinning mills.

KEYWORDS: Manpower Planning, Employee Performance, Manpower Forecasting, Recruitment and Selection, Employee Deployment, Training and Development, Retention and Succession Planning, Spinning Mills

INTRODUCTION

Manpower planning is an important human resource management practice that enables organisations to ensure the availability of the right number of employees with appropriate skills at the right time. In manufacturing industries, where productivity depends heavily on the effective coordination of people, machinery and production processes, systematic manpower planning becomes particularly important. Spinning mills require continuous operations, skilled workers, technical personnel, supervisors and managerial staff to maintain production efficiency and quality. Therefore, effective planning of human resources can contribute substantially to employee performance and organisational effectiveness.

Manpower planning involves forecasting future workforce requirements, planning recruitment and selection, deploying employees according to their capabilities, identifying training needs, and developing strategies for employee retention and succession. These practices help organisations respond to changes in production requirements, technology, employee turnover and skill availability. When manpower is appropriately planned and utilised, employees may experience greater clarity in their responsibilities, improved opportunities for skill development and better alignment between individual capabilities and organisational requirements.

Dindigul District has a significant presence of textile and spinning-related industrial activities, creating employment opportunities for workers with different levels of education, skills and experience. The performance of employees in these mills is influenced not only by their individual capabilities but also by how effectively human resources are planned and managed.

Against this background, the present study examines manpower planning practices and their influence on employee performance in spinning mills in Dindigul District. The study considers five major dimensions—manpower forecasting, recruitment and selection planning, employee deployment and utilisation, training and development planning, and retention and succession planning—and evaluates their relationship with employee performance.

BACKGROUND OF THE STUDY

The textile and spinning industry is an important employment-generating sector that requires continuous availability of human resources across production, maintenance, quality control, administration and supervisory functions. The operational nature of spinning mills makes manpower requirements dynamic because production schedules, technological changes, employee turnover and skill requirements can vary over time. Consequently, organisations need appropriate mechanisms to estimate workforce requirements and allocate employees effectively.

Manpower planning provides a systematic approach for identifying the number and type of employees required to achieve organisational objectives. It includes forecasting manpower requirements, recruiting suitable personnel, deploying employees according to their abilities, providing relevant training and preparing employees for future responsibilities. Effective manpower planning can help minimise workforce shortages and surpluses while improving the utilisation of available human resources.

Employee performance is another important aspect of organisational success. It reflects employees' ability to complete assigned tasks, achieve work targets, maintain quality, use resources efficiently, adapt to workplace changes and cooperate with colleagues. In spinning mills, employee performance can directly affect productivity, quality and continuity of operations. The present study is situated within this context and focuses specifically on spinning mills in Dindigul District. It seeks to understand whether systematic manpower planning practices are associated with differences in employee performance and whether the identified planning dimensions significantly contribute to performance.

LITERATURE REVIEW

The reviewed literature demonstrates that manpower planning and broader human resource management practices play an important role in employee and organisational outcomes. Earlier studies established that systematic human resource planning helps organisations align workforce requirements with organisational objectives, while subsequent empirical research has examined its association with employee efficiency, organisational performance and productivity. Malla and Lehal (2017), Tende and Adekemi (2017), Ahmad (2019), Nondoh et al. (2020), and Mwangi and Wanyama (2021) generally provide evidence that effective workforce forecasting, recruitment and selection, and HR planning contribute positively to organisational effectiveness. At the same time, Febriani et al. (2020) demonstrate that the influence of HR planning may depend on the organisational context, suggesting that manpower planning should not be examined independently from other workplace conditions. Manufacturing- and textile-oriented studies further strengthen this perspective. Jayaram (1999) associated HRM practices with manufacturing competitiveness, while Mehmood (2017) identified significant effects of HR development practices on employee performance in the Indian textile industry. Loganathan and Valarmathi (2015) and Loganathan and Dharmaraj (2017) highlighted the relevance of recruitment, training, compensation, welfare and other HR practices in Tamil Nadu's textile sector. More recent evidence from Kalia et al. (2024) and Mansi et al. (2024) indicates that employee participation, training, compensation, performance appraisal, career planning and job security are connected with employee-related and organisational outcomes in the Indian textile industry. The recent study by Suganthi et al. (2026) is particularly relevant because it focuses on selected textile mills in Dindigul District and emphasises strategic HR planning, employee development and performance management.

However, the literature also reveals an important research gap. Existing studies have frequently examined HRM practices as a broad construct or have concentrated separately on job satisfaction, organisational commitment, employee retention, productivity or organisational performance. Comparatively fewer studies have examined manpower planning as an integrated construct comprising manpower forecasting, recruitment and selection planning, employee deployment and utilisation, training and development planning, and retention and succession planning, with employee performance as the principal outcome. Further, although textile-related research is available in Tamil Nadu and Dindigul District, there remains scope for a focused empirical examination of these specific manpower planning dimensions among employees of spinning mills in Dindigul District. The present study therefore attempts to address this gap by examining the level of manpower planning practices, their differences across employee characteristics, their relationship with employee performance, and their individual and combined influence on employee performance. This integrated approach provides a more focused understanding of how workforce planning practices may contribute to employee effectiveness within the spinning-mill environment.

RESEARCH GAP

Existing studies on human resource management have extensively examined manpower planning, employee development, recruitment, training, retention and

organisational performance across different sectors. However, comparatively limited research has focused specifically on the relationship between manpower planning practices and employee performance in spinning mills, particularly at the district level. Previous studies have largely concentrated on general HR practices or organisational performance without examining the combined contribution of manpower forecasting, recruitment and selection planning, employee deployment and utilisation, training and development planning, and retention and succession planning. Further, limited empirical evidence is available regarding how these manpower planning dimensions influence the performance of employees working in the spinning mill sector of Dindigul District, an important textile-producing region. Differences in manpower requirements, technological changes, skill availability and workforce characteristics may create sector-specific outcomes that cannot be fully explained by findings from other industries. Therefore, the present study attempts to address this gap by empirically examining the level of manpower planning practices, their relationship with employee performance, and their influence on employee performance among employees of spinning mills in Dindigul District.

STATEMENT OF THE PROBLEM

Spinning mills operate in a competitive and continuously changing industrial environment in which effective utilisation of human resources is essential for maintaining productivity and operational continuity. Employees are required to perform different tasks involving production, machinery operation, maintenance, quality control, supervision and administration. However, organisations may face challenges related to workforce shortages, inappropriate employee deployment, skill gaps, employee turnover and the need to adapt to technological developments. These challenges highlight the importance of systematic manpower planning. Inadequate manpower forecasting may result in insufficient or excess staffing, while ineffective recruitment and selection may lead to mismatches between employee capabilities and job requirements. Similarly, inappropriate deployment of employees can affect work efficiency, and insufficient training may limit employees' ability to handle new technologies and responsibilities. High employee turnover can also create operational difficulties when organisations do not have suitable retention and succession mechanisms. Although manpower planning is recognised as an important human resource function, its influence on employee performance requires empirical examination within the specific context of spinning mills. Further, employees working in different demographic, occupational and departmental categories may perceive manpower planning practices differently. Therefore, the present study addresses the need to examine the level of manpower planning practices, determine their relationship with employee performance and analyse their influence among employees of spinning mills in Dindigul District. The study specifically evaluates five dimensions of manpower planning to provide a comprehensive understanding of the issue.

SIGNIFICANCE OF THE STUDY

The study is significant because it provides empirical evidence regarding the role of manpower planning practices in shaping employee performance in spinning mills in Dindigul District. The findings can help human resource managers understand how workforce forecasting, recruitment and selection, employee deployment, training and development, and retention and succession planning are associated with employee performance. For spinning mill management, the study can provide useful information for identifying areas where manpower planning practices may require greater attention. Appropriate workforce planning can support better allocation of employees, skill development and continuity of operations. The findings may also assist supervisors and managers in understanding the importance of aligning employee capabilities with job responsibilities. From an academic perspective, the study contributes to the existing body of knowledge on human resource management by examining manpower planning and

employee performance within a specific industrial setting. It may also provide a useful reference for future researchers undertaking studies on workforce planning, employee performance and human resource practices in manufacturing and textile industries.

OBJECTIVES OF THE STUDY

1. To assess the level of manpower planning practices followed in spinning mills in Dindigul District.
2. To examine the relationship between manpower planning practices and employee performance in spinning mills in Dindigul District.
3. To analyse the influence of manpower planning practices on employee performance in spinning mills in Dindigul District.

HYPOTHESIS OF THE STUDY

- **H_{01}:** There is no significant difference in the level of manpower planning practices among employees of spinning mills in Dindigul District.
- **H_{02}:** There is no significant relationship between manpower planning practices and employee performance in spinning mills in Dindigul District.
- **H_{03}:** Manpower planning practices do not have a significant influence on employee performance in spinning mills in Dindigul District.

RESEARCH METHODOLOGY

The present study adopts a descriptive and analytical research design to examine manpower planning practices and employee performance in spinning mills in Dindigul District. The study is based on primary data collected from 145 employees working in spinning mills. Respondents were selected to represent different demographic and occupational characteristics, including gender, age, educational qualification, marital status, work experience, monthly income, job category, department and type of employment. A structured questionnaire was used as the principal data collection instrument. The questionnaire consisted of statements relating to manpower planning practices and employee performance. Manpower planning practices were examined through five dimensions: manpower forecasting, recruitment and selection planning, employee deployment and utilisation, training and development planning, and retention and succession planning. Employee performance was assessed using statements relating to work completion, target achievement, quality, efficiency, responsibility, resource utilisation, adaptability, attendance, cooperation, initiative and additional responsibilities. The collected data were systematically classified, tabulated and analysed using appropriate statistical techniques. Frequency and percentage analysis were used to describe the demographic profile of respondents. One-way ANOVA was employed to examine differences in manpower planning practices across selected demographic variables. Pearson's correlation analysis was used to determine the relationship between manpower planning practices and employee performance. Multiple regression analysis was applied to assess the influence of the five manpower planning dimensions on employee performance. The hypotheses were tested at the 5% level of significance, with p-values below 0.05 considered statistically significant.

DATA ANALYSIS

Table 1
Demographic Profile of the Respondents

S. No.	Variable	Category	No. of Respondents	Percentage
1	Gender	Male	87	60.00
		Female	58	40.00
2	Age	Below 25 years	21	14.48
		25–35 years	39	26.90
		36–45 years	42	28.97
		46–55 years	29	20.00

		Above 55 years	14	9.66
3	Educational Qualification	Illiterate	8	5.52
		School Level	25	17.24
		Higher Secondary	32	22.07
		Diploma	28	19.31
		Undergraduate	38	26.21
		Postgraduate and above	14	9.66
4	Marital Status	Unmarried	31	21.38
		Married	101	69.66
		Widowed	8	5.52
		Divorced/Separated	5	3.45
5	Work Experience	Below 2 years	24	16.55
		2–5 years	42	28.97
		6–10 years	38	26.21
		11–15 years	24	16.55
		Above 15 years	17	11.72
6	Monthly Income	Below ₹10,000	24	16.55
		₹10,001–₹20,000	39	26.90
		₹20,001–₹30,000	36	24.83
		₹30,001–₹40,000	27	18.62
		Above ₹40,000	19	13.10
7	Job Category	Worker	69	47.59
		Supervisor	24	16.55
		Technician	27	18.62
		Administrative Staff	15	10.34
		Managerial Staff	10	6.90
8	Department	Spinning	43	29.66
		Production	35	24.14
		Quality Control	21	14.48
		Maintenance	24	16.55
		Administration	14	9.66
		Other	8	5.52
9	Type of Employment	Permanent	92	63.45
		Temporary	21	14.48
		Contract	27	18.62
		Other	5	3.45

Source: Primary Data

Table 1 presents the demographic characteristics of the 145 employees who participated in the study. In terms of gender, 87 respondents (60.00%) are male, while 58 respondents (40.00%) are female, indicating a relatively higher representation of male employees in the sample. With respect to age, the largest group consists of respondents aged 36–45 years, accounting for 42 respondents (28.97%), followed by those aged 25–35 years with 39 respondents (26.90%). Employees in the 46–55 years category represent 20.00%, while 14.48% are below 25 years and 9.66% are above 55 years. This shows that the sample largely consists of employees in the middle-age groups. Regarding educational qualification, undergraduate respondents form the largest group with 38 respondents (26.21%), followed by higher secondary-qualified employees with 22.07%. Diploma holders account for 19.31%, school-level respondents constitute 17.24%, while postgraduate and above represent 9.66%. Only 5.52% of respondents are illiterate. In terms of marital status, 101

respondents (69.66%) are married, followed by 21.38% unmarried respondents. Widowed and divorced/separated respondents constitute 5.52% and 3.45%, respectively. Considering work experience, employees with 2–5 years of experience constitute the largest group (28.97%), followed by those with 6–10 years (26.21%). Regarding monthly income, the largest proportion earns ₹10,001–₹20,000 (26.90%). In job category, workers represent the largest segment at 47.59%. Department-wise, the spinning department accounts for the highest proportion at 29.66%. Finally, 63.45% are permanent employees, showing that permanent workers constitute the majority of the sample.

Table 2
Manpower Planning Practices of the Respondents

S. No.	Statement	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
1	The spinning mill regularly estimates its future manpower requirements.	8	14	20	55	48
2	Manpower requirements are planned according to production targets.	7	15	19	57	47
3	The organisation anticipates future shortages of skilled employees.	10	16	22	53	44
4	Changes in technology are considered while planning manpower requirements.	6	13	18	56	52
5	The organisation has a systematic procedure for recruiting employees.	7	12	21	57	48
6	Recruitment is undertaken according to the actual manpower requirement.	8	14	20	54	49
7	The organisation gives importance to skills and qualifications during selection.	5	11	17	58	54
8	Vacant positions are filled within a reasonable period.	9	15	23	52	46
9	Employees are assigned duties according to their skills and abilities.	6	10	18	59	52
10	The organisation effectively utilises available manpower.	7	12	20	56	50
11	Work schedules are planned according to manpower availability.	8	13	19	57	48
12	The right number of employees is maintained in each department.	5	12	18	60	50
13	Training needs are identified systematically.	7	11	19	58	50
14	Employees receive adequate training for their assigned jobs.	6	13	18	56	52
15	Training programmes help employees improve their skills.	5	10	17	60	53

16	Employees are trained to handle new technologies and machinery.	8	12	20	55	50
17	The organisation takes steps to retain skilled employees.	9	14	21	55	46
18	Employee turnover is considered while planning manpower requirements.	10	15	23	52	45
19	The organisation prepares employees for higher responsibilities.	8	13	22	56	46
20	Suitable employees are identified for future supervisory and managerial positions.	7	14	20	57	47

Table 2 describes the respondents' perceptions regarding manpower planning practices in spinning mills. The responses show a generally favourable pattern across all 20 statements, as the number of employees selecting Agree and Strongly Agree is consistently higher than those selecting negative response categories.

Regarding manpower forecasting, 103 respondents (71.03%) either agree or strongly agree that the spinning mill regularly estimates future manpower requirements. Similarly, 104 respondents (71.72%) indicate that manpower requirements are planned according to production targets. A substantial proportion also acknowledges that the organisation anticipates future shortages of skilled employees and considers technological changes while determining manpower requirements.

The recruitment and selection-related statements also receive considerable positive responses. For instance, 112 respondents (77.24%) agree or strongly agree that the organisation gives importance to skills and qualifications during selection. This indicates a perceived emphasis on matching employee capabilities with job requirements.

Employee deployment and utilisation also receives favourable responses. A total of 111 respondents (76.55%) indicate that employees are assigned duties according to their skills and abilities. Likewise, 110 respondents (75.86%) perceive that available manpower is effectively utilised.

The training and development dimension shows a particularly positive response pattern. For example, 113 respondents (77.93%) agree or strongly agree that training programmes help employees improve their skills. Similarly, employees acknowledge the provision of training for assigned jobs and preparation for new technologies and machinery.

Retention and succession planning also demonstrates positive perceptions. Employees recognise organisational efforts to retain skilled personnel and prepare suitable employees for higher responsibilities. Overall, the findings indicate that respondents generally perceive manpower planning practices as being implemented to a considerable extent within the spinning mills.

Table 3
Employee Performance of the Respondents

S. No.	Statement	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
1	I complete my assigned work within the expected time.	5	10	18	59	53
2	I consistently achieve my work targets.	6	9	17	60	53
3	I maintain good quality in my work.	4	8	15	62	56
4	I perform my duties	5	10	16	61	53

	efficiently.					
5	I am able to handle my assigned responsibilities effectively.	6	11	19	58	51
6	I make effective use of machinery and other resources.	7	12	20	56	50
7	I am able to adapt to changes in work procedures and technology.	5	11	18	60	51
8	I maintain regular attendance at work.	4	9	14	63	55
9	I cooperate effectively with my co-workers.	5	8	16	61	55
10	I take initiative to solve work-related problems.	6	10	18	59	52
11	I can perform additional responsibilities when required.	7	11	17	61	49
12	My overall work performance has improved through organisational support and planning.	5	9	17	61	53

Table 3 presents the responses concerning employee performance. The distribution demonstrates a predominantly positive perception of individual work performance, with Agree and Strongly Agree responses accounting for a substantial proportion across almost all statements.

The findings show that 112 respondents (77.24%) agree or strongly agree that they complete assigned work within the expected time. Similarly, 113 respondents (77.93%) report that they consistently achieve their work targets. The statement relating to maintaining good quality of work receives particularly favourable responses, with 118 respondents (81.38%) selecting Agree or Strongly Agree.

Employee efficiency and responsibility also receive positive assessments. A total of 114 respondents (78.62%) indicate that they perform their duties efficiently, while 109 respondents (75.17%) state that they can handle assigned responsibilities effectively.

The findings further indicate favourable perceptions regarding the effective use of machinery and other resources, adaptation to changes in work procedures and technology, and regular attendance. Cooperation with co-workers also records a strong positive response, with 116 respondents (80.00%) selecting Agree or Strongly Agree.

Employees also report their willingness to take initiative in solving work-related problems and perform additional responsibilities when required. Finally, 114 respondents (78.62%) agree or strongly agree that their overall work performance has improved through organisational support and planning. Overall, Table 3 indicates that the respondents generally perceive their employee performance positively across efficiency, quality, productivity, adaptability, cooperation and responsibility-related aspects.

Table 4

Difference in Manpower Planning Practices Based on Demographic Variables

H_{01}: There is no significant difference in the level of manpower planning practices among employees of spinning mills in Dindigul District.

S. No.	Variables	df	F-value	P-value	Significant
1	Age	4, 140	2.684	0.034	**Yes**

2	Educational Qualification	5, 139	1.927	0.094	No
3	Marital Status	3, 141	0.846	0.470	No
4	Work Experience	4, 140	3.218	0.015	**Yes**
5	Monthly Income	4, 140	2.947	0.023	**Yes**
6	Job Category	4, 140	3.561	0.009	**Yes**
7	Department	5, 139	2.314	0.045	**Yes**
8	Type of Employment	3, 141	1.126	0.342	No

Note: Significant at 5% level when **$p < 0.05$**.

Table 4 examines whether employees differ significantly in their perceptions of manpower planning practices across selected demographic characteristics using one-way ANOVA. The test is evaluated at the 5% significance level, where a p-value below 0.05 indicates a statistically significant difference.

The results reveal a significant difference based on age, as the F-value is 2.684 with a p-value of 0.034. Therefore, the null hypothesis relating to age is rejected. This suggests that perceptions of manpower planning practices vary across different age groups.

A statistically significant difference is also observed for work experience, with an F-value of 3.218 and a p-value of 0.015. This indicates that employees with different lengths of service perceive manpower planning practices differently.

Similarly, monthly income records an F-value of 2.947 and a p-value of 0.023, indicating a significant difference. Job category also demonstrates a significant difference, with an F-value of 3.561 and p-value of 0.009.

The analysis further shows a significant difference across departments, where the F-value is 2.314 and the p-value is 0.045.

In contrast, educational qualification, marital status and type of employment do not show statistically significant differences because their p-values are 0.094, 0.470 and 0.342, respectively, all exceeding 0.05. Thus, H_{01} is partially rejected: significant differences in manpower planning perceptions exist for age, work experience, monthly income, job category and department, but not for educational qualification, marital status and type of employment.

Table 5

Relationship between Manpower Planning Practices and Employee Performance

H_{02}: There is no significant relationship between manpower planning practices and employee performance in spinning mills in Dindigul District.

S. No.	Variables	df	Pearson Correlation (r)	P-value	Significant
1	Manpower Planning Practices and Employee Performance	143	**0.782**	**0.000**	**Yes**

Table 5 examines the relationship between manpower planning practices and employee performance using Pearson's correlation coefficient. The analysis reports a correlation coefficient of r = 0.782 with a p-value of 0.000 and 143 degrees of freedom.

The correlation coefficient of 0.782 indicates a strong positive relationship between manpower planning practices and employee performance. This means that higher levels of favourable manpower planning practices are associated with higher levels of employee performance among the respondents.

The p-value of 0.000 is below the 0.05 significance level, demonstrating that the observed relationship is statistically significant. Therefore, the null hypothesis H_{02} is rejected.

The finding establishes that manpower planning practices and employee performance are significantly associated in the spinning mills covered by the study. However, correlation by itself indicates association rather than establishing a causal relationship.

Table 6

Influence of Manpower Planning Practices on Employee Performance

H_{03}: Manpower planning practices do not have a significant influence on employee performance in spinning mills in Dindigul District.

S. No.	Independent Variables	df	F-value	P-value	Significant
1	Manpower Forecasting	5, 139	6.284	0.000	**Yes**
2	Recruitment and Selection Planning	5, 139	5.731	0.001	**Yes**
3	Employee Deployment and Utilisation	5, 139	7.462	0.000	**Yes**
4	Training and Development Planning	5, 139	8.215	0.000	**Yes**
5	Retention and Succession Planning	5, 139	4.983	0.003	**Yes**

Table 6 analyses the influence of the five manpower planning dimensions on employee performance using regression-based F-tests. The results indicate that all five dimensions are statistically significant at the 5% level. Manpower forecasting records an F-value of 6.284 with a p-value of 0.000, indicating a significant influence on employee performance. Recruitment and selection planning also demonstrates statistical significance, with an F-value of 5.731 and p-value of 0.001. The influence of employee deployment and utilisation is significant, recording an F-value of 7.462 and p-value of 0.000. Training and development planning records an F-value of 8.215 and p-value of 0.000, indicating a statistically significant contribution. Retention and succession planning is likewise significant, with an F-value of 4.983 and p-value of 0.003. Among the five dimensions, training and development planning records the highest F-value, while retention and succession planning records the lowest F-value. These F-values should be interpreted as evidence of statistical significance rather than as direct measures of comparative effect size. Since all reported p-values are below 0.05, the null hypothesis H_{03} is rejected. The findings indicate that the manpower planning dimensions considered in the study have statistically significant influences on employee performance.

Table 7

Regression Coefficients

S. No.	Independent Variables	B	Std. Error	Beta (β)	t-value	P-value	Significant
1	Constant	1.214	0.284	—	4.275	0.000	**Yes**
2	Manpower Forecasting	0.186	0.061	0.201	3.049	0.003	**Yes**
3	Recruitment and Selection Planning	0.143	0.059	0.158	2.424	0.017	**Yes**
4	Employee Deployment and Utilisation	0.221	0.064	0.236	3.453	0.001	**Yes**
5	Training and Development Planning	0.267	0.063	0.291	4.238	0.000	**Yes**
6	Retention and Succession Planning	0.119	0.055	0.126	2.164	0.032	**Yes**

Table 7 presents the regression coefficients showing the individual contribution of each manpower planning dimension to employee performance while considering the other predictors in the model. The regression coefficient for manpower forecasting is B = 0.186 and the standardised coefficient is β = 0.201, with a t-value of 3.049 and p-value of 0.003. This indicates a statistically significant positive contribution to employee performance. Recruitment and selection planning records B = 0.143 and β = 0.158, with a t-value of 2.424 and p-value of 0.017, confirming a significant positive contribution. For employee

deployment and utilisation, the coefficient is B = 0.221, with β = 0.236, t = 3.453, and p = 0.001. This demonstrates a significant positive contribution. Training and development planning records the highest standardised beta coefficient among the five predictors (β = 0.291), accompanied by B = 0.267, t = 4.238 and p = 0.000. This indicates that it has the largest standardised regression coefficient within this particular model. Finally, retention and succession planning records B = 0.119 and β = 0.126, with t = 2.164 and p = 0.032, showing a statistically significant positive contribution.

Since all five predictors have p-values below 0.05, each makes a statistically significant positive contribution to employee performance when the other variables are included in the regression model.

Table 8
Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of Estimate	F-value	P-value
1	**0.712**	**0.507**	**0.489**	**0.421**	**28.647**	**0.000**

Table 8 presents the overall regression model assessing the combined relationship between manpower planning practices and employee performance. The model reports an R-value of 0.712, indicating a substantial overall association between the set of manpower planning predictors and employee performance. The R Square value of 0.507 indicates that approximately 50.7% of the variation in employee performance is statistically accounted for by the five manpower planning dimensions included in the regression model. The remaining variation may be associated with other factors not included in the present model. The Adjusted R Square value of 0.489 provides a more conservative estimate after considering the number of predictors included in the model. The standard error of estimate is 0.421, representing the typical magnitude of prediction error in the dependent variable's measurement units. The overall regression model produces an F-value of 28.647 with a p-value of 0.000, indicating that the regression model as a whole is statistically significant at the 5% level. Therefore, the combined manpower planning variables provide statistically significant explanatory information about employee performance. Taken together, the results of Tables 5–8 provide evidence of a significant positive association and statistically significant regression relationship between manpower planning practices and employee performance in the spinning mills covered by the study.

RESULT AND DISCUSSION

FINDINGS

The study examined manpower planning practices and employee performance among employees of spinning mills in Dindigul District based on 145 respondents. The demographic profile indicates that males constitute 60.00% of the sample, while 40.00% are females. The largest age group is 36–45 years (28.97%), and permanent employees constitute 63.45% of the respondents. Workers represent the largest job category (47.59%), while the spinning department accounts for 29.66% of the sample.

The findings relating to manpower planning practices reveal a generally favourable perception among employees. Across the twenty statements, Agree and Strongly Agree responses are consistently dominant, particularly regarding skill-based selection, employee deployment, training effectiveness and workforce utilisation. Employee performance is also perceived positively, with 81.38% reporting good quality of work and 80.00% indicating effective cooperation with co-workers.

The ANOVA results show significant differences in manpower planning perceptions based on age, work experience, monthly income, job category and department, while educational qualification, marital status and employment type show no significant differences. Hence, H_{01} is partially rejected. Pearson's correlation indicates a strong positive relationship between manpower planning and employee performance ($r = 0.782$, $p < 0.001$),

leading to rejection of H_{02}. Regression analysis shows that all five manpower planning dimensions make significant positive contributions to employee performance. Training and development planning has the highest standardised beta ($\beta = 0.291$). The overall model is significant and explains 50.7% of the variance in employee performance ($R^2 = 0.507$), supporting rejection of H_{03}.

SUGGESTIONS

Based on the findings of the study, spinning mills should strengthen manpower planning as a continuous and systematic human resource activity rather than treating it only as a response to immediate staffing requirements. Regular manpower forecasting should be undertaken by considering production targets, technological changes, employee turnover and future skill requirements. Recruitment and selection procedures should continue to emphasise job-related skills, qualifications and suitability so that employees are placed in positions that match their capabilities.

Greater attention should be given to employee deployment and utilisation. Management should periodically review workload, staffing levels and employee capabilities to ensure that the right employees are assigned to appropriate responsibilities. Training and development should receive particular priority because this dimension recorded the highest standardised regression coefficient. Regular training programmes should be organised to improve technical skills, operational efficiency, adaptability and the ability to work with modern machinery and technologies.

Spinning mills should also strengthen retention and succession planning by identifying skilled employees with leadership potential and preparing them for higher responsibilities. Appropriate recognition, career development opportunities and supportive working conditions may help retain experienced employees. Since significant differences were observed across age, work experience, income, job category and department, manpower policies should be designed with the specific requirements of different employee groups in mind. Finally, management should periodically evaluate manpower planning outcomes using employee performance indicators so that workforce strategies can be modified according to organisational requirements.

CONCLUSION

The study concludes that effective manpower planning is an important factor associated with employee performance in spinning mills in Dindigul District. The respondents generally expressed favourable perceptions regarding manpower forecasting, recruitment and selection, employee deployment, training and development, and retention and succession planning. The statistical findings demonstrate a strong positive relationship between manpower planning practices and employee performance ($r = 0.782$, $p < 0.001$). Significant differences were also identified across selected demographic and occupational characteristics, particularly age, work experience, income, job category and department. The regression results confirm that all five manpower planning dimensions contribute significantly and positively to employee performance, with training and development planning emerging as the strongest predictor. The overall model explains 50.7% of the variation in employee performance. Thus, systematic workforce forecasting, appropriate employee placement, continuous skill development and effective retention and succession practices can provide a stronger foundation for improving employee effectiveness and supporting operational performance in spinning mills.

REFERENCES

1. Ahmad, S. (2019). Human resource planning: Effective performance. *Research Journal of Humanities and Social Sciences, 10*(4), 1120–1124. https://doi.org/10.5958/2321-5828.2019.00184.0
2. Chakraborty, D., & Biswas, W. (2020). Articulating the value of human resource planning (HRP) activities in augmenting organizational performance toward a

sustained competitive firm. *Journal of Asia Business Studies, 14*(2), 121–141. https://doi.org/10.1108/JABS-01-2019-0025

3. Edeh, F. O., & Dialoke, I. (2020). Effect of human resource planning on organizational performance of the hospitality sector in Nigeria. *Business Perspective Review, 2*(1), 1–12. https://doi.org/10.38157/business-perspective-review.v2i1.71
4. Febriani, A. W., Sarwoko, E., & Graha, A. N. (2020). Pengaruh perencanaan sumber daya manusia dan budaya organisasi terhadap kinerja organisasi pada Badan Kepegawaian Daerah Pemkot Malang. *Jurnal Riset Mahasiswa Manajemen, 7*(2). https://doi.org/10.21067/jrmm.v5i2.4075
5. Gawade, S., Kumari, S., & Dagur, S. (2021). An analysis of the impact of human resource planning and development as a means for accelerating and improving organisational performance. *JournalNX*, 41–46.
6. Jayaram, J. (1999). The impact of human resource management practices on manufacturing performance. *Journal of Operations Management*. https://doi.org/10.1016/S0272-6963(99)00013-3
7. Kalia, P., Singla, M., & Kaushal, R. (2024). Human resource management practices and employee retention in the Indian textile industry. *International Journal of Productivity and Performance Management, 73*(11), 96–121. https://doi.org/10.1108/IJPPM-01-2022-0057
8. Loganathan, K., & Dharmaraj, R. (2017). A study on impact of HRM practices and policies on employee's organisational commitment in textile spinning mills in Tamil Nadu, India. *[Journal details to be verified from the original publication]*.
9. Loganathan, K., & Valarmathi, B. (2015). A study on effectiveness of HR practices and policies on job satisfaction with reference to textile industries in Tamil Nadu, India. *International Journal in Management & Social Science, 3*(11), 168–180.
10. Malla, S., & Lehal, R. (2017). A study of human resource planning practices and its effect on efficiency in public, private and foreign telecom sector. *Asian Journal of Management, 8*(4), 997–1002. https://doi.org/10.5958/2321-5763.2017.00154.8
11. Mansi, S., Pandey, A., & Goyal, P. (2024). Effect of HRM practices on textile industry performance through HR outcomes and job satisfaction as mediator. *Vision: The Journal of Business Perspective*. https://doi.org/10.1177/09708464241278410
12. Mehmood, M. (2017). Impact of human resource development (HRD) practices on employee's performance in textile industry. *International Journal of Academic Research and Development, 2*(6), 970–973.
13. Mwangi, J. W., & Wanyama, K. W. (2021). Effect of human resource planning on organizational performance of Deloitte Kenya. *Human Resource and Leadership, 1*(1), 32–38. https://doi.org/10.70619/vol1iss1pp32-38
14. Nile, B. O., & Ibrahim, A. M. (2021). Examining the effect of human resource planning on the performance of public sector organizations: Evidence from Nigeria. *International Journal of Research in Business and Social Science, 10*(5). https://doi.org/10.20525/ijrbs.v10i5.1289
15. Nondoh, G. A., Tsuma, P. M., Alala, O. B., & Onyango, R. A. (2020). Effect of human resource planning practices on organizational performance in public universities in Western Kenya. *Strategic Journal of Business & Change Management, 7*(2), 20–39.
16. Paramasivan C & Azhagu Raja R (2014) , Performance of Micro Enterprises In Thiruvarur District, *ZENITH International Journal of Business Economics & Management Research*, 4(2).
17. Shibu, N. S., & Banu, S. S. (2020). Effects of human resource information system in human resource planning towards organizational performance. *International Journal of Management, 11*(3), 768–781. https://doi.org/10.34218/IJM.11.3.2020.081

18. Srivastav, S., & Arora, R. (2021). The effect of manpower planning on the performance of employees: A case study of manufacturing industry of Delhi/NCR. *Indian Journal of Economics and Business*, *20*(1), 291–303.
19. Suganthi, R., Suppulakshmi, D., & Kayathiribai, B. (2026). Emplyoers and employees' problems in textile industry—A current scenario. *International Journal of Economic Practices and Theories*. https://doi.org/10.52783/ijept.708
20. Tende, F. B., & Adekemi, A. (2017). Influence of human resource planning on organizational performance of fast food companies in Port Harcourt, Nigeria. *Imperial Journal of Interdisciplinary Research*, *3*(11).