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**Effect of Dreyful Model On Motor Vehicle Mechanic Work Trade (MVMW) on Students Performance and Interest in Colleges, in Bauchi State.**

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**ABSTRACT:** *This study identified the effect of Dreyful Model on Motor Vehicle Mechanic Work trade (MVMW) on student's performance and interest in technical colleges in Bauchi State. Pre-test, post-test, non-equivalent control group quasi-experimental design, was used to guide the study. Specifically, the study seeks to find out the effect of using; Dreyful Model of training compared to Lectures method on student's performance and interest on Motor Vehicle Mechanic Work Trade. The population for this study comprises of 100 respondents NTC I/II students of MVMW. The sample size for this study was 80 NTC I/II students and 20 teachers were selected for the study. Instruments used for data collection were: Auto-mechanics Achievement Test (AAT) with 50 multiple questions, marking scheme answers options (A-C) and Auto-Mechanics Interest Inventory (AMII) with 40 items. Score guide sheet based on five-point rating scale was used by teachers. The research work will help to improve the performance and interest of the students in (MVMW) in technical colleges of Bauchi State.*

**KEYWORDS:** Dreyful Model, Auto-Mechanics, Interest Inventory, Motor Vehicle, Mechanic Work.

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## INTRODUCTION

Many students of this day found it difficult to study MVMW because they see it as after graduation they will remain as mechanic or to teach any related MVMW subject without knowing that MVMW has many job opportunities that can lead them to become somebody in future. Motor vehicle mechanic work trade (MVMW) is one of the subjects currently on the curriculum of the technical colleges. Doyin (2004) stated that Motor Vehicle Mechanic Work is one of the Technical College programs which involve the acquisition of scientific knowledge in maintenance and repairing of Motor Vehicles., The motor vehicle mechanic work trade should be designed to help students understand the basic MVMW theories and principles in order to differentiate from road side mechanic and also enable the students to understand an effective identification of faults, and recommendation for maintenance and repair. According to United States Department of Industries (2009) maintenance and repairing in automobile

enable students of Motor Vehicle Mechanic Work to know different types of diesel and petrol automobile maintenance, when to maintain an Automobile, how to carry out maintenance and repairing on parts of the Automobile. Technical colleges play a vital role in Nigeria. They train and produce technicians for industry; they impart vital technical skills in youths. They help towards the goal of employment, job creation and in the struggle towards technological development. The goal of Motor Vehicle Mechanic work according to the National Board for Technical Education (NBTE) (2006) is to produce skilled craftsmen with good knowledge of working principles of motor vehicles, the techniques and safety practices involved in its maintenance. Almost all sort of transportation at present day depend largely on the use of motor vehicle mechanic work trade for daily activities. Every day, millions of people use their cars, trucks, vans, as their primary means of transportation. This resulted for the need of skilled Motor Vehicle Mechanic Work trade for routine, corrective and predictive maintenance. According to Bauchi State Ministry of Education (2021) record in regard to the performance of the students in NABTEB Examination, MVMW result 2019, 2020, and 2021, was observed that the students in MVMW is very low, because the number of candidates who qualified for admission into tertiary institution in the Bauchi State seem to be dwindling year by year it could be as a result of so many factors. Owoso *et al.*, (2006). Automobile technology involves the application of science, knowledge in the design selection of materials construction operation repairs maintenance of tools and equipment.

The number of students that sat for NABTEB in MVMW at government technical colleges Bauchi did not change much within the past of three years 2019 to 2022. For instance in 2019, 10 students sat for the exam but only 3 pass the exam. In 2020, 11 students sat for the exam but only 4 pass the exam, and also in 2021, 11 students sat for the exam but only 2 pass the exam, Similarly the number of students sat for the examination MVMW in government technical college Gamawa local government showed little or no change within the past of three years 2019 to 2021 For instance in 2019, 9 students sat for the exam but only 2 pass the exam. In 2020, 9 students but only 2 pass the exam, and also in 2021, 8 students sat for the exam but only 1 pass the exam, (Bauchi State government 2022) NABTEB (2015) report show that the level of performance in MVMW subjects was lower than expectation as most of the student scores less than 50% in MVMW subject. This calls for a serious investigation. Even though researches have been conducted in different areas of technical education for instance, among the researches Musa (2015) conducted a study on the effect of dreyful Model training career guidance on soap marking and bakery skill acquisition of a apprentices for employment in Niger State. Also George *et al.*, (2021) effect of dreyful Model training on MVMW student's skill acquisition in technical college in North East Nigeria. But little or no research was conducted on effect of Dreyful Model on MVMW students in performance and interest in technical colleges in Bauchi State which the researches see it an opportunity to investigate on the issues.

## **METHODOLOGY**

Experimental research design was adopted for the study. Experimental research is a process that provides a systematic and logical procedure of identifying and evaluating the relationship

between variable that create a particular state of affairs under controlled condition. One in which you test an idea (or practice or procedure) to determine whether it influences an outcome or dependent variable. (Musa and Jibrin, 2021), the study was pre-tested, post-tested, non-equivalent control group quasi-experimental design. The population for the study was 100 respondents comprising of 20 teachers from the three (3) technical colleges in Bauchi state, six from each of the three (3) educational zone and 80NTC II/ III students in technical colleges offering MVMW in Bauchi state.

Due to the few numbers of MVMW teachers and students in the technical colleges in Bauchi State, the entire teachers/ students were used as the sample hence no sampling was adopted. (Bauchi Ministry of Education Quality Assurance Units 2016). Auto-mechanics Achievement Test (AAT) with 50 multiple questions, marking scheme answers options (A-C) and Auto-Mechanics Interest Inventory (AMII) with 40 items. Score guide sheet based on five-point rating scale used by teachers or ratters was used for data collection and was validated at School of Vocational and Technical Education, Department of Technical Education Abubakar Tatari Ali polytechnic Bauchi. And one (1) from the Department of Technical Education and one expert from Department of Educational Foundation, Faculty of Technical Education Abubakar Tafawa Balewa University, (ATBU) Bauchi State. The data was collected from the respondents through personal contact and service of a trained research assistants and retrieval.

## RESULT

The data obtained was analyzed based on the responses of the respondents as presented below: Research Question 1. What is the effect of Dreyful Model of training and lecture method on students and interest on MVMW trade in technical colleges in Bauchi State Technical colleges?

S/N		SA	A	D	SD	UD	Mean(x)	Remark
	Lack of planning and financing in							
	Education system affect the per for	22	16	20	2	0	4.5	Agreed
	And interest In MVMW							
	Lack of standard motor vehicle							
	Workshop and equipment affect	30	14	6	6	4	4.0	Agreed
	Performance of student in							
	MVMW							
	Endemic strike by teachers affects							
	The Performance of student in	26	30	4	0	0	4.4	Agreed
	MVMW							

Over-crowdedness of students in							
Classes also affect students	18	24	12	2	4	3.8	Agreed
Performance in MVMW							
Inadequacy of school infrastructure							
Affect students' performance in MVMW	36	4	10	5	6	44.2	Agreed
Grand mean						4.18	

Table 1 above shows that items number 1 to 5 had the mean rating of 4.5, 4.0, 4.4 3.8, and 4.2 Respectively. Which are above the cut off mean of 3.0 signifying that the identified factors affect the performance of students in motor vehicle mechanic trade in Government technical colleges?

Research Question 2. Do the qualities of teacher's effect of Dreyful Model compare to lecture method on students' performance and interest of MVMW in technical colleges of Bauchi State?

S/N		SA	A	D	SD	UD	Mean(x)	Remark
Lack of motivation on the part of								
	Teacher affect performance of the Student in motor vehicle mechanic	12	28		14	0	3.8	Agree
1. Inadequate practical on the part of								
	the teachers affect MVMW	26	18	8	6	2	4.0	Agreed
the performance of students'?								
8. Continue use of old outdated								
Curriculum and lecture method								
	Used by teachers affect the	36	12	8	0	4	4.3	Agreed
Performance and interest of students in								

Motor vehicle mechanic							
9. Poor attitude of some teachers							
As well as that the student	42	10	4	2	2	4.5	Agreed
Affecting performance and interest of student							
In MVMW							
10. Lack of qualified teachers in							
affects the performance	22	26	4	4	4	4.0	Agreed
of student in MVMW							
Grand mean							
						4.12	

Table 2 shows that items number 6 to 10 had the mean of 3.7, 4.0, 4.3, 4.7, and 3.9 Agreed that teacher quality affect the performance of students in motor vehicle mechanic in Bauchi state. Research Question 3 What is the strategies by using Dreyful Model for improving students' performance and interest in MVMW in technical colleges in Bauchi State?

S/N	SA	A	D	SD	UD	Mean(x)	Remark
11. Government should review hazard							
and other related allowance for	42	10	6	0	4	4.5	Agreed
Technical teacher							
12. Adequate consumable materials							
Should be supplied by the gover	26	24	0	6	4	4.0	Agreed
nment as at due. This will in							
Enhance practical trainings							
13. Government should provide							
enough instructional materials							

modern, equipment and facilities	34	18	2	4	2	4.3	Agreed
in motor vehicle workshops to Imp-							
rove performance in the subject.							
14. Government should organizing							
seminars, workshop and refresher							
courses for motor vehicle mechanic	40	18	0	0	2	4.6	Agreed
teacher this will improve teacher							
student performance							
15. Involving student to make practical							
could service as motivation way that	38	12	6	4	0	4.4	Agreed
will improve student performance in							
motor vehicle mechanic							
Grand mean						4.36	

Table 3 indicate that items number 11-15 the mean at 4.5, 4.0, 4.3, 4.6 and 4.4 respectively which shows that there is need for the above strategies in order to improve the performance of students in government technical colleges.

## DISCUSSION OF FINDINGS

From the analysis, quite a number of factors have been identified to be one of the factors affecting MVMW and interest in government technical colleges in Bauchi state.

Those factors are:

- i. Inadequate instructional material, tools and equipment in motor vehicle mechanic workshop in government technical colleges in Bauchi state as can be seen from the analysis of the adequacy of instructional, materials, tools and equipment of checklist of the various schools in the research work.
- ii.
- iii. Lack of planning and financing the educational system
- iv. Poor attitude of some teachers as well as that of students
- v. Analysis also showed that apart from those five factors that affects the performance of students, endemic strike by teacher, lack of educational planning, monitoring and evaluation on the part of the government as well as some strategies to be used by government so as to

improve the performance of students in motor vehicle mechanic trade in technical colleges in Bauchi state.

### **Limitation**

The research work was limited to three (3) technical colleges offering motor vehicle mechanic trade in Bauchi state in which sixty (80) respondents were used, thirty (30) from Government Technical Bauchi, twenty five (25) from Government Technical College Kafin mdaki, and twenty five (25) from Government Technical College Azare.

### **CONCLUSION**

The issue of getting admission or employment by motor vehicle mechanic secondary school graduates has been of primary concern to the government, graduates and their parents in the local government. This has called for study to find out the reasons for poor performance and interest of students in motor vehicle mechanic trade most especially in technical colleges in Bauchi State, the findings in table 1 to 3 shows that inadequacy of instructional materials, tools and equipment while table 4 to 6 identified other factors that lead to the poor performance and interest is the teacher qualities in technical college offering motor vehicle mechanic work.

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