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The relationship between female students' perception of technical industrial trades and their enrolment in technical and secondary schools in the Kumba III municipality

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Abstract

When girls" access to technical industrial education is limited or hampered, it would mean that women participation in nation building will be lagging behind as far as technical know-how and application is concerned This study investigated female student's perception of Technical Industrial trades and their enrolment in technical schools in Kumba III municipality. The theories that were used to support the findings of this study were the gender base schema theory and human capital theory,. The research methodology employed comprised of a combination of quantitative and qualitative techniques in data collection. Triangulation was preferred in other to enlarge information possibilities. It was designed to respond to questions as to whether female student's perception of Technical Industrial trades influences their enrolment. The sample consisted of 75 female students drawn from three technical schools in Kumba III municipality. A Likert-scale question cuve was used for data collection and the respondents were required to strongly agree, Agree, strongly disagree and to disagree with the questionnaire items. Data were analyzed using descriptive and inferential statistical analysis, using the statistical package for social science (SPSS) version 22.0. The main findings of the study revealed that female student' perception of technical industrial trade has an influence on their enrolment. On the basis of this finding, recommendations were made to improve on female students' enrolment in technical industrial trades. Based on the results of the finding stated above, we discussed the findings using the gender schema theory of Bem (1981), the human capital theory of Becker (2005) and career choice theory. We conclude that female students perception have a strong influence on their access to technical industrial education at the secondary level. Given these results we have made recommendations to stake holders include; government, teachers, parents, female students and the community regarding girls" access to technical education.

Keywords:

Technical Industrial Trades, Perception, Enrolment.

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Introduction

The challenges of industrialisation and technological development are global issues that may questioned the appropriateness of our educational system and the demand for education. The working world is changing rapidly and school orientation should be concerned with the preparation of young people for work life and occupational choice. Schools should develop human capabilities that would match the labour market needs and opportunities. To align education with the perceived requirements of the work environment; the curriculum drivers highly recommended are technology, science, engineering, and mathematics (Skilbeck et al, 1994; UNESCO, 1999). These are options responsible for infrastructural and socioeconomic transformation. They offer huge labour market opportunities for youth and adult employment as well as valorize a country's potential both in its human and material resources. Technical and vocational education is one of these drivers reputed for nation building and especially important in managing the flow of pupils graduating from primary schools (Che, 2010).TVE provides multiple path ways for students into the world of work. It is important for passing on cultural craftsmanship and values, developing critical thinking (minds), training in specialised skills, and rural development (UNESCO, 2004).

Female student's perception of technical industrial trades in society varies significantly depending on cultural, attitudinal, situational and institutional factors (Societal stereotypes, educational environment, curriculum design, role models and career opportunities) Education and training in Cameroon still shows evidence of women's unequal access to and participation in industrial technical fields. Right from birth, parents perceive and treat their male and female children differently. Boys and girls are given different toys, their rooms are arranged differently, play different roles at home and so on. This discriminatory treatment of males and females according to Hassan, E. M. (1998) is not different in the educational set up. At the pre-school levels, the mates are given models of cars, care-tires, screw drivers and hammers, whereas their females are given model baby dolls, ladle coal-pot, sauce pan, apron and others, to play with. At the basic and secondary levels teachers directly and indirectly encourage the male and students to pursue technical courses like technical drawing, metal work, wood work, block work and the female students to pursue courses like, home economics, catering and dressmaking.

Understanding the context of Female Students' Perception on Technical Industrial Trade in Cameroon.

Technical and vocational education in Cameroon as a component of formal education was introduced as far back in 1947 by the French colonial administration. The purpose was to enable Africans acquire skills that would enable them participate in the construction of roads, railways, plantations, buildings, bridges and so no. Thus carpenters, mechanics, brick layers, iron benders, plumbers and so no were trained. This was an expansion of the indigenous craftsmanship of the blacksmith who was/is responsible for the production of agriculture tools, the potter for utensils, weavers for basket and roofing covering, the builders for construction of houses and so on. During that time formation was based strictly on gender role; boys were oriented in the industrial trades and girls for the vocational home economics.

The separation of industrial and home economics education showed a pattern that conformed to traditional education (Fonkeng, 2007). It was not conceivable at that time to think of a woman as a technician. A technician was considered a male who could repair mechanical or electronic devices or products; turn screws, bolts and nuts (Ajayi, et al., 2011). Over five decades since independence and coupled with the tenants of globalization, it is absurd to hold on to this pattern of enrolment yet attitudes have hardly changed and this practice is still ongoing.

Technical and Vocational education is a people centered kind of education that is able to provide employment to all individuals for the development of their communities especially in the rural areas (Bowles & Gintis, 1976). According to South-South Study (2010) the new objective for technical and vocational education for Cameroon and owing to its vast rural occupation of about 75 percent includes;

a) Improve access to training. It targets to increase the number of enrollees to 150000 by 2015 and have at least one excellent vocational training centre per division.
b) Better integrate the technical and vocational streams into the overall educational system.
c) Build and renovate technical and vocational training centres.
d) Strengthen the link between TVET and the labour market.
e) Develop programs using skill base approach.
f) Increase funding for Technical and vocational training.

Considering the importance of these objectives which sets out to develop human resource and strengthen their link with the labour market, TVE is an important education that should not be viewed as more suitable for a particular gender than the other. Rather the total human resource capital of a nation need to be develop in ways that will facilitate their insertion into the socio professional life for optimum benefit to the community. Skill training is a prerequisite for industrialization and has been and is still the major player in the development of advanced economies such as Europe, America, and Asia. Unfortunate for Africa and Cameroon in particular our colonial fathers forgot to introduce this type of education or did so in the most derogatory manner so as to make Africa dependent on the metropolis (Fonkeng, 2007). While in the metropolis technical education was making progress in challenging development, in Africa outdated medieval arts and literature was the main focus of the educational system to produce bureaucrats who will take up offices in the colonial administration. This is the first false step of in attaining development for African- the neglect of technical education. White collar job was considered more important than the "blue jacket" job and as such, the admiration of every parent was to enroll children in the grammar education options that will place them in the public service.

Girls and women have been on the front line as far as equality in education is concern. Parity in education has been accepted as a fundamental principle of Human Rights and an adequate measure to achieve equality (MDG 3, 2001). The 1945 UN Charter and many other declarations of both international and national recognition have in recent times urge

governments to see the need to narrow the gap between men and women as a development goal. Where women cannot afford equal rights as men then they cannot achieve development in a sustainable way (UNFPA, 2006). The 1997, UNDP Human Development Report asserted that the starting point for poverty eradication is to empower men and women and to ensure their participation in decisions that affects their lives. In this technologically driven era such empowerment should extend to include girls and women on the same footing with their male counterpart in all spheres of education. Regrettably there still exist areas where women are highly underrepresented. According to the Scientific, Technical and Vocational Education for Girls in Africa (1997) report noted that girls in Africa feature very insignificant in science,technology, engineering and mathematics (STEM) courses and programmes. It believes that in a world increasingly shaped by science and technology, scientific and technological literacy is a universal requirement. It is vital to improve scientific and technological literacy among women and girls, whose unique educational function within the family makes them such a major determinant of attitude of present and future generations" STEM Education is therefore the basis for the full promotion of and improvement of the status of women (Nairobi Looking Forward Strategies, 1985).

Women and girls have attained some acceptable level in formal education owing to the international requirement of free and compulsory primary education (UN 1945 Charter on Human Right, EFA.1996, Beijng.1994, MDG. 2000). This, not withstanding, women need more than to know how to read and write. They need to be equipped with relevant knowledge and skills that industrialisation demands. Unfortunately, there still exist huge barriers (early marriage, early pregnancy, heavy domestic chores, male preference, girls" economic role, child labour...) that hinder female access to technologically driven education. Women who donot attain school cannot enroll in industrial technical and as a consequent low enrollment is evident in this aspect. No country can attain industrialisation if its potential labour force is not skilled oriented qualitatively and quantitatively sufficient. UNESCO (2010) recommends at least 200 scientists and 250 engineers per million people for effective industrialization in Africa. If this has to be true for Cameroon it is important then to raise awareness on the danger of leaving out women in this very important aspect of education.

Women and girls constitute more than half of the population of most nations and are important vessels to acquire this knowledge and then transmit it even unto their children (Beijing, 1995). It is therefore, essential to make Hands–on education a functional reality for every woman. Mustapha (1999) asserted that the grooming of individuals in skill performance has been recognized as a major area to increase workers productivity, create wealth and alleviate poverty. Cameroon, on its part in 1995 organised a National Education Forum to correct the mistake of an over indulgence into academic education and adapted an educational Orientation law which laid down new guide lines for the technical education objectives as follows.

a) Create institutional conditions for an effective vocational training system.
b) Improve job marching and facilitate the transmission from training to employment

In the 1994 Orientation Law on Education in Cameroon, technical and vocational education has been reputed as the master key for sustainable development owing to its readiness in work orientation. In recent times, several educational forums have accorded technical education a top priority with the emphasis on professionalization and the development of a skilled manpower for Emergence 2035. Despite this profound recognition, skilled training has not been given a priority position in our educational dispensations. It is plagued with many hindrances such as; hostile economic environment, lack of teachers in quality and quantity, inadequate infrastructure, obsolete equipment, poor relationship between the system and the socio-professional milieu, archaic curriculum, lack of relevant textbooks and the inflexible gender attitude in selecting trades, just to name but a few. In relation to gender attitude in enrolment which is our focus, traditional perception of appropriate roles for men and women in the work place need to be challenged. Technical and vocational Education must respond with gender-inclusive learning programme, both in content and delivery including measures to attract women into previously dominated male training and careers and vice versa. Faculty need to be gender-sensitive (UNESCO, 1996).

With industrialization and technological development, girls can no longer rely on their traditional limited range of opportunities. Most occupations will be technological inclined andunless girls acquire the necessary skills, they cannot access them. For women to be technological relevant, they must move towards this new knowledge. Women‟s poverty has been linked to the kind of jobs they do stemming from their education.Jobs that take much energy, effort and time but pays less (UNDP, 2010). Also, many of society‟s problems are best solved by the application of technology. For these discoveries to be useful, they need to be adopted and adapted to a majority of the population. Women owing to their majority population and other strengths, their increased participation in these areas can bring about improve wellbeing and also facilitate the building of a skill culture in the present and future generations of Africa children. The education of girls in nontraditional option is essential to the achievement of quality learning environment in the 21st Century.

Low general enrolment in TVE signals stagnation and an overall poor public training capacity. The African Union‟s Agenda of 2063 vision and an approach calls for a paradigm shift. It envisage an integrated, prosperous and peaceful Africa, driven by its own citizens and representing a dynamic force in the global era. To achieve this it seeks to develop a human capitals grounded in knowledge and reputed in skill performance as well as valorize values such as passion for Pan Africanism, sense of unity, self-reliance, integration and solidarity. Education in science, mathematics, engineering and technology are pivotal to achieve Agenda 2063. Parity in all fields of education and youth representation in all cycles are measures to ensure a positive socio-economic transformation in the next fifty years. In this pursuit TVET has been remarked as a panacea for development which will reduce poverty, accelerate industrialization, enhance good governance, promote social peace and stability and achieve economic progress. Thus, as inroads towards planet 50-50 by 2030 women representation in engineering education is a call for concern.

In the international scene, the United Nations and its specialized agencies; UNESCO, UNIGEI, World Bank, UNDP, and so on are devoting huge material and human resources to raise awareness especially on Sub-African states to increase their participation in technical education. Sub-Sahara Africa countries register remarkable low rates in skilled manpower and according to the World Economic Forum 2014 Cameroon was ranked 121 out of 148 in skilled labour (OECD, 2014). This signals a situation of acute shortage in skilled labour which is not healthy for the 2035 economic emergence. Economic emergence presupposes industrialisation and this demands a huge skilled labour force comprising men and women who can harness the rich natural resources of the nation for production of goods and servicesfor quality livelihood. A sure way to acquire a qualitative and quantitative skilled work force is through quality and gender inclusive technical and vocational education.

Conceptual Framework

Equality between men and women is a top priority on international debates as a development goal and a tool for social progress, CEDAW (1979), World Conference on Human Rights (1993), Millennium Development Goals (2000) and so on. Education is considered on all platforms as an essential tool to obtain equal and full participation of women in development, to promote and improve on the status of women and to valorised the contributions of women. The status quo of women need to be valorised beyond ordinary literacy to functional and pragmatic literacy that will increase livelihood and promote welfare. One of such important placement is in technical industrial education were female representation has the highest pitfall UNESCO (1999). Che Kum (2010) suggests that owing to the fast development and the sea of changes taking place in the field of technology today, it is imperative for us to take drastic steps and adopt the changes in educational strategy, in curriculum and as well as in industrial technology to remain in the line with the other advanced countries. If we remain aloof these changes we will lag behind countries and also we will not be able to compete in the world market in industrial product.

Skill oriented base education is less thought of as a vital area for women to develop their potentials and contribute to the development of their communities. Female education has been centered chiefly in equipping women with knowledge, skills and attitude to perform their traditional role of good wife and mother. This has led to the saturation of girls‟ enrolment in grammar school. Human resource development for women has been mainly knowledge focus. This has placed the women in a less advantageous situation in the current labour market which is technological driven. The prevalence of this situation is likely to plunged women in situation of increase unemployment because the jobs of their educational orientations may be in less demand. Ironically, the public image associated with technical education in Cameroon is not beneficial to enrolment in general and female in particular. The society has often had a negative view on skill education as an education for the less intellectually endowed, children of poor parents, less educated and is often associated with servitude (Megan, 2002; Carrefour de l‟éducation, 2004). These perceptions many researchers support stems as far back as colonial era which compared manual work to

servitude and hasled to a situation where according to The World Economic Forum (2014) Cameroon was ranked 121 out of 148 in skilled labour.

According to the World Bank report (2012) on attaining gender equality and development, three challenges were identified which if eradicated will move the future of girls‟ education. They include; reducing segregation in the field of study especially in STEM; improving learning outcome and addressing the need of severely disadvantaged populations. Reducing gender segregation in STEM will involves also valorizing technical education as a whole including attracting females in male dominated industrial technical fields such as Civil Engineering, Mechanical Engineering, and Electrical Engineering. The Education for All (1995) initiative is to reduce the gap between girls and boys enrolment rate. UNIGEF Medium-Term Strategy (1996-2006) noted that the respect for traditional gender role in occupational orientation was a remarkable cause of setback on female job opportunity and the progress of society as a whole. To solve this, requires a change mentality from the aged long "white collar" mentality to a technological mind frame. The youths are pivotal in this drive, to this Che Kum (2010) believes that, this process of change can be accelerated if measures are taken to imbibe in our youths the qualities like enthusiasm for life-long learning, critical thinking, eagerness to accept challenges of new situations and new problems, positive flexible habits to change besides providing knowledge, specific skills and habits for work.

The provision of employment is a central aim of education. High skilled, high paid jobs are associated with Technical and Vocational education and should be an attraction to parents and students alike. However this is not so, the national enrolment of TVE covers less than 30 percent of students‟ enrolments in secondary education over the years. For example, the national students‟ enrolment for the academic year 2010\2011 for example was 321,859 students for technical and vocational education as against 1,252,592 students for grammar education; representing 27.69 percent and 62.21 percent respectively. (MINESEC, 2011; UNESCO, 2011).This situation is not only unhealthy for a country that envisaged economy emergence by 2035 but also is frustrating on the country‟s vision of poverty alleviation through job creation and economic progress if this dichotomy is maintained. In this light, the concentration on mental and the theoretical exercises rather than manual and practical experiences has prepared most students for neither job, nor family, nor responsibilities of citizenship (Simon, 1999).

Youth unemployment in Cameroon is a menace for social peace and economic progress. According to the National Employment Fund report (April, 2014), youthunemployment is about 30 percent. The problem is in multiple facets including the reluctance of youths to accept hands-on education and training, poor work attitude and the increase desire in leisure and entertainment as oppose to work, Loitering culture leading drug abuse, high alcohol consumption, money laundry, scamming and other related crimes. This is huge waste on human resources to have educated youths who spend their time on nothing productive. The causes may be many but a wrong type of education is a major concern. In a predominant agricultural country, a dominant grammar education orientation will do less than produce humans who cannot harness the country‟s resources. Grammar education graduates job

seekers not job makers; while technical education economic movers who are able to create jobs for themselves and others.

There is no doubt that education empowers but to inculcate the fact that it should formerly provide a job (especially by the state) at the end is misleading and accounts for the reason why huge numbers register yearly for public examinations and only a very few succeed, thus deepening the frustration of school graduates and their parents. Despite these unpleasant results parents continue to cherish the hope and aspiration of university education that leads to high positions jobs in the administration. The consequence is a prejudice against and a less positive image for technical education.

The political will to bring Technical and Vocational Education in the limelight has been too slow. As evident in public life in Cameroon graduates of grammar education hold leading positions even in technical based areas. The entrance examinations into technical institutions of higher learning base on languages and mathematics operates to give grammar education graduates greater opportunities. The case of ENSET is alarming where many of the students‟ teachers are GCE Advance Level and Degree holders. This phenomenon produces high grade but less technically qualified teachers who have neither learned nor acquired skills to pass onto students. This is disturbing coupled with the other short comings such as; reduced number of technical colleges, poorly equipped workshops and laboratories, obsolete equipment, inadequate infrastructures, irrelevant curriculum, lack of teachers, few technical teacher training colleges and the lack of an open-door policy to enter university for technical education (Megan, 2009; Carrefour of education, 2013). Technical education is therefore viewed by many as a dead end. Also, enrolment deficiencies and gender disparities are pressing issues in the TVET sector that need to be resolved. To prepare students to acquire the knowledge and skills needed in the increasingly sophisticated world, technical education must be revitalised in all spheres including; relevant curriculum to social realities, innovativetext books, quality teacher training, productive teaching and infrastructure and connection between industries and technical institution (Che, 2010)

For far too long, the Cameroonian people have been ill-advised that technical education is inferior and second-hand, yet all industrialized economies (US, Germany, Singapore, France, China and others) have had to rely on this type of education for their advancement. True emergence will begin by challenging the poor public conceptions about TVE and inculcating in the youth the love of self-reliance, and the emergence of an entrepreneurial class which will reduce dependence on employment in the public sector. TVE is the rightful education that will harness the natural potentials and advances economic, social and cultural development in a competitive environment UNESCO (2010). Rejecting TVE and the perpetuation of gender base discrimination in certain fields of specialization will not only increase youth unemployment, but will also drain the country's resources through the employment of expatriates to fill the gap created by gender discrimination.

Research in girls‟ education exposed the following unpleasant revelations contributed by socio-cultural, economic and religious factors, they include; non-schooling, early withdrawal

from schools, withdrawal caused by early marriages, parents preference for male child education over females, low performance, stereotyped against certain knowledge and skills. (UNESCO, 1998; Beijing 1995; UNMDG, 2001). A combination of factors occurring at home, on the way to school, in school and in the community at large have culminated to hold back women's and girl's contributions to the development of their community. This study is aimed at unrevealing these factors on that path way of women's progress.

Statement of the Problem

Attempts to valorize technical and vocational education so that it is gender inclusive in all trades was reinforced in Cameroon by the Education Orientation laws of 1996 as a follow up towards equal demand of education for boys and girls in this domain. In this light, many reforms have been implemented in the direction of school planting, curriculum and teachers" development, textbooks and so on. Though not sufficient when compared with the changing times it is at least laudable. Every Sub Division has at least a Government Technical College (GTC) and at least a Government Technical High School (GTHS) in every Division (MINESEC, 2012). In relation to curriculum development, there is a continuous expansion on options offered in technical colleges. For example, in GTHS Bamenda the number of industrial options have increased from eight (8) in 2010/2011 to eleven (11) options in 2014/2015. On teachers" development programme, the number of higher technical teachers" training colleges has increased from one to three (ENSET Douala, Bamenda and Kumba). Despite the efforts devoted to valorise TVE in Cameroon, there still exist a variety of problems plaguing the sector remarkably is the wide disparities in the demand of technical industrial education by boys and girls.

Technical education plays a crucial role in poverty eradication, job creation, sustainable development and actualization of the transformation agenda, and it is one of the best forms of education because it offers problem solving abilities and hand-on-experience to students. However, technical industrial trades are dominated by male students. Their female counterparts show less interest and negative perception due to some cultural, institutional and attitudinal factors. Compounded by societal gender stereotypes and biases. If the nation must emerge by 2035, there should unavoidably be strives in creating public awareness, to attract girls in technical trades so as to balance the social injustices and open doors for sustainable development. This study therefore aims at examining female students' perception of technical industrial trades insecondary technical schools in Kumba III municipality. A positive change in mentality will generate massive enrolment by female students in technical industrial trades and this paradigm will match with the fast-changing world in terms of technology andcreativity.

Female access to educational opportunity is a call for concern generally as education holds the key to female empowerment and poverty alleviation which has a direct positive impact on the welfare of the family. Thus, a remarkable low participation of female in education could affect these attainments. Employment is closely linked to the level and type of educational orientation. Today we are slammed with an alarming unemployment rate of 30 percent in

Cameroon (National Employment Fund, 2014). Educated youths constitute a greater proportion of the unemployed and females make up 19.7 percent (NIS, 2013). This phenomenon is quite disturbing and remains a huge challenge to the educational system that seeks to provide long life learning. The national focus should be towards minimising the incidence of unemployment. Technical and vocational education is one of the sure ways to minimise human resource wastage through providing individuals with skills which they can employ in either a paid job or self-employment.

Female reluctance to enroll in non-traditional options is a continuous challenge to all educational stakeholders. This affirmed the assertion that occupations are gender stereotypes (Tchombe, 2007, Matchinda, 2008). This means there is "male" and "female" adequacy in career orientation perpetuated by a subtle but penetrative gender male practices. The persistence of this notion has led to a situation where technical industrial education seems to be barred against girls, registering very low national enrolment rate 3.5 percent and 2.3 retention rate over several years (MINESEC, 2013). This signifies that 97 percent of females in Cameroon are technically illiterate. That is girls who cannot turn screws, nuts and bolts, or simply wear the „blue jacket". This is reflected in their socio professional life and has perpetuated a culture of lack of role models. Social stereotypes, parental influence and sociocultural practices could be amongst the factors affecting female access to technical industrial education.

Rowe (1978) announced that just being female was a „special handicap" in science, mathematics, engineering and technology. Girls are believed to know less, do less, explore less, and are presented to be more delicate than boys. While not minimising on female traditional gender trades, it is necessary for females to diversify their educational orientations in order to increase their employment opportunities in today"s highly skilled related labour market. Skills such as metal work, woodwork, construction, electricity, and so on are all necessary for students to compete for employment positions in the 2035 emergence plan.Therefore, maintaining this enrolment pattern will have serious consequences on girls and could have an effect or even retard the attainment of vision 2035.

In the 21st century all individuals need to possess some problem-solving skill. Though most of the industrial domains are male dominant, there are still some girls who choose to enroll in a male dominated specialization. It has been observed that these girls, who orientate themselves in the industrial domains, do perform better than most boys. It would be interesting to investigate not only the factors that serve as barriers for girls enrolment in industrial options, but also, how those girls who enroll cope with their studies and the environment. For the factors that create these barriers cannot be ignored especially as the euphoria of technical industrial education for girls seems to be dying down slowly but surely. When girls do not acquire technical industrial skills, it implies that their participation in the nation's development will be wanting; and as such bring stagnation in the socio-economic progress of the society. Also, limited access of girls to industrial education would also mean that the objectives of equal opportunity and empowerment of women and emancipation have not been attained and the huge resources injected in such a venture were wasted.

Industrialization is one of the main keys to society's sustainable development and if girls are not involved in the acquisition of competences that would enable them to participate in the industrial program, it would mean that the emergency by 2035 remains bleak and poverty would never be eradicated. It is against this backdrop that we want to study the various sociocultural aspects that influence female access to technical- industrial education in Cameroon.

LITERATURE REVIEW

Female Students' Perception

Technical education and training of both men and women is very vital for the overall development of the nation because both boys and girls have vital roles to play towards the growth and development of the society. Perception in the opinion of Wonacott (2012) is the process whereby people select, organize and interpret sensory stimulations into significant information about their environment, he goes further to state that perception is the single most important determinant of human behaviour. Arnould et al (2019), see perception as the way people view and interpret the world around them. Unarguably, females are underrepresented in many of the technical industrial trades as a result of negative societal perception (Wonacott, 2012). Jones, (2016) in a book titled "Breaking barriers," explored how societal stereotypes and gender biases impact the perception of technical industrial trades among female students, suggesting strategies to break down barriers.

Traditionally, technical industrial trades have been dominated by men, leading to thedevelopment of gender stereotypes about the suitability of these trades for women. Thesestereotypes may affect the career choices of female students and their overall performancein these fields. The underrepresentation of women in technical industrial trades has beena long-standing issue. Stereotypes and gender bias play a significant role in perpetuatingthis imbalance.

Research by Brown et al. (2015) indicates that societal stereotypes portray these fields asmore suitable for men, Stereotypes portray technical trades as physically demanding,dirty, and requiring brute strength, which may discourage women from considering thesecareer paths; hence leading to a lack of representation and role models for women. Thesestereotypes can create a sense of exclusion and discourage female students fromconsidering technical trades as viable career options.

Judith Butler (1990) said that Gender norms are per formative acts, behaviours, andexpressions that individuals repeatedly engage in to conform to societal expectationswhile Sandra Bem (1981) also said Gender norms are shaped by gender schema theory,where individuals' developmental frameworks based on societal cues, influencing theirperceptions of gender roles. Gender norms also contribute to the perception that womenshould pursue careers in fields such as healthcare, education, or social sciences, whichare often perceived as more "feminine" occupations. This societal conditioning can createbarriers for female

students who may feel pressure to conform to these expectations ratherthan exploring technical industrial trades.

According to a study by the American Psychological Association (2015), thesestereotypes can lead to self-limiting beliefs and a lack of confidence in girls and women when it comes to pursuing careers in non-traditional fields. Research by the Australian Government Department of Education, Skills and Employment (2020) also found that traditional gender roles and expectations play a significant role in shaping youngwomen's perceptions of industrial trades. Stereotypes associated with technical industrial trades often portray them as masculine domains, reinforcing the perception that these fields are more suitable for men. These stereotypes can discourage women from pursuing careers in these areas, leading to theirunderrepresentation. Several studies have examined the impact of these stereotypes onfemale students. A study by Steele and Aronson (2004) examines how the presence ofgender stereotypes affects the performance of women in male-dominated fields, such astechnical industrial trades. It highlights the role of stereotype threat, which is the fear ofconfirming a negative stereotype, in affecting women's performance in these fields.

Accordingly, Stout (2011) found that female students who were exposed to gender-stereotyped advertisements for technical trades were less likely to express interest inpursuing careers in those fields compared to female students who were not exposed tosuch advertisements. This suggests that stereotypes can influence the career aspirationsof female students and limit their exploration of technical industrial trades.Similarly, research by Cheryan (2009) demonstrated that women's interest incomputerscience decreased when the environment was portrayed as stereotypically masculine. Thisindicates that negative stereotypes can create a psychological barrier for women,impacting their motivation and self-efficacy in pursuing technical trades. Also, Heilmanand Mruczek (2004) investigates how gender stereotypes affect the evaluation ofwomen's performance in male-dominated professions, such as construction. The researchfindings suggest that women are often undervalued in these fields due to the prevalenceof gender stereotypes.

According to research, female students are often expected to conform to traditional genderroles, such as being nurturing and submissive, and are often socialized to prioritizerelationships and domesticity over academic achievement (Hall, 2016). This can lead tofemale students feeling pressure to balance their academic goals with their perceivedgender roles, which can negatively impact their academic performance and motivation(Ladson-Billings, 1995).One approach is to promote positive role models and showcase successful women intechnical industrial trades. Research by Stout et al. (2015) demonstrated that exposure tofemale role models increased female students' interest and self-efficacy in pursuingcareers in technical fields. By providing visible examples of successful women,stereotypes can be challenged, and female students can envision themselves succeedingin these trades.

A study by Spencer, Steele, and Quinn (2000) explores strategies to address stereotypethreat in women pursuing male-dominated professions, such as technical industrial trades.The

researchers suggest that interventions, such as providing role models and fostering asupportive environment, can help mitigate the negative effects of stereotype threat onwomen's performance in these fields. It stated that from an early age many females lackconfidence in themselves and have negative attitudes towards science and technical tradessubjects which consequently inhibit their performance in the technical subjects.

Kane (1990) also writing on the fate of the African woman in technical and vocationaltraining, observes that women prefer work which is respected and valued by thecommunity as women's work, most of which is an extension of female domestic activitiesin addition to trading. According to Kane, women perceive the market as a place whereif all else fails one can go and make money. She also noted that girls lack clear picture ofhow to achieve success in their occupational aspirations and do not have concrete andrealistic ideas about occupation they are likely to get and how to excel. These personalperceptions she notes, limit their aspiration in vocational and technical industrialeducation, which affect their participation in those field.

Studies have consistently found that female students tend to have lower levels of interestand confidence in technical industrial trades compared to their male counterparts. A studyby Smith and Turner (2010) found that female students often perceive technical trades asmasculine, physically demanding, and lacking opportunities for career advancement. Thisperception can discourage them from pursuing careers in these fields.

Theoretical framework

The Gender Base Schema Theory

Dr Sandra Lipsitz Bem is a psychologist and the author of the gender schema theory developed in 1981. The theory is centred on how individuals come to gender as an organising category in all aspects of their lives. That is the theory attempts to explain how information about gender role attitude might impact perception and the expectations of men and women in society. The theory combines aspects of social learning theory and cognitive development theory of sex acquisition.

Bem in 1981, created the Bem Sex Role Inventory to measure how well individuals can fit into their traditional gender role by characterising their personality as masculine, feminine, androgynous or undifferentiated. She believed that, through gender schematic processing a person spontaneously sort attributes and behaviour into masculine and feminine categories. Bem (1981) defines a schema as „a cognitive structure of network of association that organises and guides an individual"s perception". A schema functions, as an anticipatory structure, a readiness to search and to assimilate incoming information in schema–related terms. Other functions of the schema identified by Bem (1981) include; the readiness to process information in terms of a particular schema, to organize information in schema-related categories, to make highly differentiated categories and when given a choice will choose to make discrimination along those same dimensions. Gender schemas thus involve a generalised readiness to process information on the basis of sex linked association.

Every society allocates roles on the basis of sex. Boys and girls are expected to acquire sex specific skills and self-concepts that are masculine or feminine as prescribed by their particular cultures. The ability to perform these roles is largely constructed from information children gather from parents and other elderly members in the community, the experiences open to them, the objects of their play time and so on. For example, girls receive baby toys, kitchen sets etc for a birthday gift while boys may receive toy trucks, guns, cars etc as birthday gifts. Also in school, girls cleaning and boys the clearing; at home the boy splits wood while the girl washes plates. These examples in functions send messages of gender role attributes. In addition to such content specific information, children also learn to evoke a network of sex related associations in order to evaluate and process new information. Thus, Bem (1981) holds the premise that gender is a mentally organised pattern of behaviour that helps children sort out perceived information.

The gender schema contains information about many aspects of men and women in a given society. Often this involves a diverse and sprawling network of association encompassing features directly related to male and female such as anatomy, reproduction, function, division of labour and so on. And also personality attributes such as how to smile, sit, dance, and eat. Generally, schema includes behaviour characteristics of male and female. Bem 1981 posited that gender role schema comprised two types of human behaviour characteristics, feminine and masculine. Traditional feminine traits include affectionate, cheerful, compassionate and eager to sooth hurt feelings, gentle, sensitive to the needs of others, soft spoken, warm and yielding. On the other hand, traditional masculine traits include: acting as a leader (instructional), aggressive, ambitious, athletic, competitive, dominant, forceful and makes decisions easily. In general masculine traits are associated with instrumental orientation, a cognitive focus on getting the job done. And feminine traits are of an expressive orientation, an effective concern of the welfare of others.

From the perspectives of this theory and given that schema helps individual process information; The information that children received during early socialisation at home and even later in schools are internalised and become base for appropriate feminine or masculine perception. Their assigned roles and division of labour, further conceal these ideas. These ideas impact on their personality and self-concept and consequently their interest which they express in the choice of courses and options in their educational careers. Bem (1981) noted that women are traditionally expected to have a homogenous goal of marriage, have children, care for family and so on. This primary interest leads parents and girls to opt for careers that may establish a balance between family life and work. Women domestic responsibilities have also been proven by several researches to be a cause for women persistence on traditional careers and their unwillingness to give a try to other areas. The inflexibility of society to relax on social norms and values; practices and believes concerning women roles are principally responsible for the prevalence of women in traditional career orientations and their relegation in matters of leadership.

Human Capital Theory

The concept of human capital was developed in the mid-20th Century, because of the change in the value of education. It is Becker‟s classical study of how investment in an individual‟s education, training is similar to business investment in equipment. It is founded on the notion that education increases workers productivity and consequently greater economic output. Education creates and develops skills which facilitate higher levels of productivity amongst those who possess them in comparison with those who do not. It asserts that individualsacquire knowledge, skills and the right attitude to increase their value in the labour market. According to Becker (2005), Human Capital is the stock of competences, knowledge, skills and personal attributes embodied in an individual that provide the ability to perform work (task). In relation to a nation, Human Capital can be regarded as the sum total of the capacities of all the individuals in a community relevant for economic activities. This will take into consideration the level of intelligence, education, creativity, innovativeness, health and wellbeing, capacity for empathy and caring that individuals in the society possess and are willing to devote it for the welfare of themselves and others OECD (1988).

Human Knowledge is wealth and should be nurture, developed and productive.Human capital theory therefore, focuses on the economic behaviour of individuals, especially on the way their accumulation of knowledge and skills will enable them to increase their productivity and wealth and consequently increase the productivity and wealth of the society in which they live in. There is strong and empirically, verifiable, positive relationship between the wages and salaries people receive at work and the level of education attained. Following the competitiveness of the labour market, people with higher level of education will end higher wages. Research has asserted that high skill jobs are paid high wages. As a result this explains why employers use educational characteristics as a proxy for suitability and potential productivity. On the other hand, those with less or no education tend to have earning profiles which remain flat throughout life, an indication that not only do education increase productivity but also enhances the ability to learn-by-doing, causing productivity and thus earnings.

Education and health are the key factors to improve human capital and ultimately increase the economic output of a nation (Becker, 1993). Education is costly and entails huge sacrifices humanly, financially and materially but its associated benefits make it a worthwhile venture. The benefits associated with increase welfare is highly linked with female education as their education will impact family life in terms of better nutrition, better disease follow up, support education of children, space delivery and so no (UNESCO,1989). Females are expected to use knowledge, skills and the right kind of attitude acquired in other to make relevant the other resources; land capital and entrepreneurship. As a factor of production, human resource wastage is the worst economic blunder that no nation should encourage. Sadly this is seemingly true in our context where knowledge, skills and attitudes acquired through education are not employed in production due to increased rate of unemployment (National Employment Fund, 2014). Experience, training and education are the three principal ways to acquire knowledge, skills and attitudes to increase individual‟s performance in either a paid

job or a self-employed job and these must be relevant to the socio-economic realities of the community. Unfortunatelythe type of education that many of our college graduates have is those that make them more job seekers than job makers and because the current socio economic demand is production intensive not administration many are unemployed.

Human behavior is based on the economic self-interest of the individual operating within the freely competitive market (Schultz, 1976). The school system is pivotal in inculcating into individuals the potentials required to be economic relevant. Through its curriculum, pedagogic practices (teaching/learning), textbooks, and educational programmes, the school system develops the workforce for present and future generations of the nation. The sellable curriculum in this technological driven era are those that relate to science, technology, engineering and mathematics (STEM) (UNESCO, 1999; Che, 2010). This therefore denotes that, the human capital of a nation is a function of its educational system. Compulsory education is not sufficient, new education system that will reinforce and maintained the economic status in the global knowledge driven should be encouraged. Invest in people today for higher returns tomorrow (Berker, 1972).

Women constitute a vibrant population in Cameroon owing to their majority population of 52.3 percent (Institute of National Statistics, 2010) and play very important roles in reproduction and production. As mothers, they are the first teachers of the children and it is believed that educational investment on women will produce tremendous impact in assuring healthy families and better educated children in morals and otherwise. Every nation that expects to develop cannot afford to leave behind women in its development prospects. Labour is the second important resource in the production of goods and services the others being land, capital and entrepreneurship. Labour is a dynamic and flexible resource that nations have used to attain development in this technologically driven age for example Singapore. Through an inclusive and technology intensive education system Singapore developed a skilled workforce that transformed its economy into modern state in record time. The human capital theory therefore seeks to valorise all individuals as potential economic contributors. Knowledge and skills acquisition in hand-on work training/ learning can permit both female and male to try options not linked to their gender. This will provide employable skills to young people and ease their access to the labour market.

Proponents of Human Capital theory opine that: - Human beings are viewed as capital and therefore entail returns. - Mincer (1994) believes that a worker‟s income increases as his/her level of education increases. - Increased human capital results in high productivity and thus high wages.
There exists discrimination in the market place which reduces the real income of those discriminated against (Becker, 1992). It is only when can increase their participation in high skilled oriented career that female poverty can considerable reduced.

According to Mincer (1994) the educated worker has more advantages when compared to the less educated worker; higher wages, greater employment stability, greater forward mobility in income and status and greater opportunity for job appointments in leadership. Blair (1999)

opines, that the more one learns the more he/she earns. By these assertions therefore the lot of women can be improved upon by their involvement in a broad-spectrum education orientation that does not only limit them to their traditional gender roles but even engineering options which presently are male dominated. The low earnings of the poor have been greatly associated to their relatively low investment in education and labour market discrimination practices (Blair, 1999). Education therefore has the potential to alter the wellbeing of individuals by enhancing their earning power through work related behaviour

Work is a human need and an activity that holds the key to human happiness and fulfillment (Marx, 1863). It is the means to fulfill basic needs, self-image and self-worth and is pivotal in the production of goods and services. Employment is related to social and political stability, a true reflection of good governance. Where unemployment is minimised the people support of the government is high, criminality and other vices are reduced. Considering therefore, the importance of work in society, it is important for the government to take seriously technical and vocational education renowned in skill training and work orientation. Human capital theory suggests that women can improve their situation by acquiring more and different kinds of knowledge and skill through education, training and experience. Poverty is the result of insufficient investment (Berker, 1972).

Human capital theory as the name implies is the extension of physical capital investment in human beings. This theory applies aptly in our study and context where educated youth unemployment is a pressing problem facing the government of Cameroon.Youth unemployment is a malice and challenge to the educational system and other policy issues. It calls for a quick intervention. The important role of technical and vocational education which train in skills either for a paid job or self-employment is laudable in our present situation. The government of Cameroon should valorise TVE by eliminating road blocks on female access to TVE so that they can increase their earning power. In Cameroon, gender inclusive measures abound on „paper" but the actually implementation is lacking. This retards female full contributions to the development of their communities. And considering their majority population, any nation that does not fight toeliminate discrimination will be loosening out on its human resource potentials and cannot increase its wealth both quantitatively and qualitatively. Human capital theory therefore upholds that the true riches of any nation is not the vast natural resources that may abound but an educated, skilled and talented workforce that are able to transform their environment and create wealth.

Methods

The research design for this study was cross sectional through which data were gathered from a cross section of schools, students within a specific period of time. The area of study is Kumba III municipality. The target population was made up of 130 females from three technical colleges in Kumba III municipality.

Table 1: Target Population

S/N	Schools	Class	Population
1	GTC Teke	Form 4	20
2	GTHS Kumba	Form 5 Lower sixth	30 25
3	GTHS Kang Barombi	Form 5 lower sixth	25 30
Total	**3**		**130**

Table 2: Sample size

S/N	Schools	Class	Sample
1	GTHS Kumba	Form 5 Lower sixth	10 20
2	GTC Teke	Form 4	15
3	GTHS Kang Barombi	Form 5 Lower sixth	15 15
Total	**3**		**75**

Hypothesis

The working hypothesis for this paper posits that "There is a significant relationship between female students' perception of industrial trade and their enrolment. There is no significant relationship between female students' perception of industrial trade and their enrolment.

Table 3: Female students' knowledge on industrial trade and their enrolment in technical secondary schools

No	Items	Response options				
		SA (%)	A (%)	SD (%)	D (%)	TF (%)
1	I am aware of the diverse career options available in technical industrial trades	23 (30.7%)	26 (34.7%)	10 (13.3%)	16 (21.3%)	75
2	I believe there are significant barriers preventing individuals, especially females, from entering technical industrial trades.	23 (30.7%)	24 (32%)	25 (20%)	13 (17.3%)	75
3	I know that I cannot do anything positive in industrial trades	24 (32%)	13 (17.3%)	15 (20%)	23 (30.7%)	75
4	I am interested in exploring opportunities in technical industrial trades, even if I do not know them.	30 (40%)	15 (20%)	17 (22.7%)	13 (17.3%)	75
5	I have a good understanding of current trends and	21 (28%)	17 (22.7%)	17 (22.7%0	20 (26.7%)	75

	innovations in technical industrial trades.					
6	l am aware of the different technical industrial trades in technical schools	23 (30.6%)	26 (34.6%)	16 (21.4%)	10 (13.4%)	75
7	I know fully well that technical industrial trades are mostly reserved only for boys	18 (24%)	52 (33.3%)	12 (16%)	20 (26.7%)	75
8	I did not receive sufficient guidance or encouragement to explore technical industrial trades options	40 (53.4%)	10 (13.3%)	5 (6.6%)	20 (26.7%)	75
9	I felt limited or discouraged to pursue technical industrial trades due to lack of female role models representing this domain	13 (17.4%)	27 (36%)	9 (12%)	26 (34.6%)	75
10	I believe technical industrial trades are very important for today's economy and personal development	12 (16%)	22 (29.3)	20 (26.7%)	21 (28%)	75
	Total	227 (30.3%)	205 (27.3%)	136 (18.2%)	182 (24.2)	750

Table 3 above reveals that most of the respondents stood for the opinion that theyare aware of the diverse career options available in technical industrial trades 49(65.4%) while those who are not aware recorded 26(34.6%) (item 1). Moreover, 47(62.7%) of the respondents held the opinion that they believe there are significant barriers preventing individuals, especially females, from entering technical industrial trades whereas 28(37.3%) disagreed 2. Also, 37(49.3%) of respondents agreed that they know that they cannot do anything positive in industrial trades while 38(50.79%) disagreed. 45(60%) of the respondents generally agreed that they are interested in exploring opportunities in technical industrial trades, even if they know them meanwhile 30(40%) disagreed.

Furthermore, 38(50.7%) agreed that I have a good understanding of current trends and innovations in technical industrial trades while 37(49.3%) disagreed. Also, 49(65.2%) of the respondents generally agreed that they are aware of the different technical industrial trades in technical schools but 26(34.8%) generally disagreed. 43(57.3%) agreed that they know fully well that technical industrial trades are mostly reserved only for boys while 32(42.7%) disagreed. In this light, 50(66.7%) of the respondents stood for the fact that they did not receive sufficient guidance or encouragement to explore technical industrial trades options meanwhile 35(46.6%) reject it. Again, 40(53.4%) accepted that they felt limited or discouraged to pursue technical industrial trades due to lack of female rolemodels representing their domain meanwhile 35(46.6%) disagreed 9. Lastly, 34(45.3%) generally agreed that they believe technical industrial trades are very important for today's economy and personal development while 41(54.7%) disagreed. From the results presented above, it shows that, majority of the respondents 43(57.6%) generally affirmed that Female students' knowledge influence their enrolment in technical industrial trades while 31(42.4%) disagreed.

This hypothesis was tested using Fieldman Chi square analysis procedure to examine female students' knowledge of industrial trade and their enrolment in technical secondary school in the Kuma III municipality

Table 4: Friedman's chi-square

Chi-square	24.26a
Df	3
A symp.sig	.000

Friedman test (Critical txy=7.81)
From table 4 above, Friedman's chi-square was read at 24.261a with the degree of freedom (df)3, p=0.000, which was less than 0.05. The decision rule states that when P is less than the level of significance ($p<0.05$), we reject the null hypothesis and adopt the alternative hypothesis. Also, the null hypothesis is rejected when the calculated table value (24.261a) is more than the critical tabular value (7.81) Therefore, the null hypothesis was rejected and the alternative retained.

Discussion And Conclusion

The findings of this study revealed that there is a significant relationship between female students' knowledge of industrial trade and their enrolment in technical secondary schools in Kumba III municipality. The x^2 calculated value (24.261a) was greater than the critical value (7.81) at 0.05 level of significance; so, we upheld the alternative hypothesis.From the analysis above we can deduce that female students' knowledge of industrial trade is a factor influencing their enrolment. This finding ties with that of Jerom Bruner (1960) who said knowledge is the understanding, awareness or familiarity that an individual possesses about facts, information, skills concepts o principles acquired through experiences education, observation or study.

Research Implications are identified including the need for applied research in learning communities factoring in variables for family structure, expectations, ethnicity, communication, and involvement. Parenting style focuses on two major elements of parenting: parental responsiveness and parental demandingness. Parental responsiveness (parental warmth or supportiveness) refers to the extent to which parents intentionally foster individuality, selfregulation, and self-assertion by being attuned, supportive, and acquiescent to children's special needs and demands (Baumrind,1991). This is quite different from the fact we obtained from the field. For many students especially female students were not receiving support for their parents as far as their education is concerned. This would certainly go a long way to discourage them from schooling and performing better.

Understanding the level of knowledge and awareness among female students can help identify barriers and develop strategies to encourage their participation in industrial trades Research by Smith (20150 highlights that many female students have limited exposure to

information about technical careers, leading to lack of awareness about the opportunities available in these fields. Additionally, Jones (2018) found that misconceptions about the nature of technical industrial trades often deter female students from pursuing education and careers in these areas. Early exposure to hands- on activities and vocational education can positively influence girls' interest in non-traditional causes (Dabney & Tai,2019). Providing opportunities for female students to explore industrial trades during their schooling years can help challenges perceived nation about gender-specific career paths.

The results also indicated that when students feel supported and loved by their parents, they have more confidence in their own ability to find career information and to choose a career that would be interesting and exciting to them. This is important because other research shows that adolescents who feel efficacious regarding career decision-making tend to make more satisfying career choices later in life Parental attachment Navin (2009) has been shown to be positively correlated with career exploration. Navin (2009) found that parental attachment, defined as the extent to which one feels emotionally close to and supported by ones parents, was positively related to career exploration.. Similarly, according to Navin (2009), Lee and Hughey (2001) found that parental attachment was positively correlated with career maturity, which is defined, as how prepared an adolescent is to make career decisions. Though career maturity may not be synonymous with career exploration, career exploration is a necessary step in the process of gaining career maturity.

According to Navin (2009), parental attachment is important for self-efficacy, defined as how confident an individual is that he/she will be good at his/her future career. Effective career exploration is necessary to facilitate feelings of career self-efficacy. This study also lends support to the idea that parental attachment is important for career exploration. Some researchers have suggested that the reason for the relationship between parental attachment and various aspects of career development is that a secure attachment to one„s parents provides a safe place for one to go for emotional support (Navin, 2009). Career exploration requires that an individual actively seek out information from various professionals such as counselors. This type ofbehavior has the potential to be scary or stressful for a young adult. Thus, the security of parental attachment is important in that they help the individual feel emotionally supported and protected.

It could be argued that the manner in which culture has unequally distributed the various social roles of boys and girls is detrimental to the girl child as it does not enable her have enough time to concentrate on her academic work. It is however surprisingly that men still question the capacity of women in technical education positions. This is based on the fact that the society is patriarchal thus hindering or disfavoring any attempt even unconsciously to foster females' education. According to social role theory, men are expected to assume roles that demand agency and dominance, whereas women are expected to assume roles that demand cooperation and submissiveness. When women violate these social roles, they are more likely to be the targets of disciplines. This is an element of social injustice mated on the girl folks.

However, the findings also revealed that; parental influence will have negative effect on adolescent's career choice; there is significant effect of parental influence on adolescents career choice; and that parental attitude to work will have significant effect on adolescents" career choice based on societal values and expectation. These results agree with sociologists view that the range of occupations that an individual will consider in choosing a career is determined largely by the status expectations of the social class to which he belongs (Friesen, 1981).

The implications of the sociologists" view for counseling according to Friesen is that the vocational choices people make are related to their social class, and the social origins of an individual limit the range of occupational opportunities available to the person. Students who come from poor homes often find it difficult to continue their education while those from rich homes obtain much encouragement from their families and peers to continue their studies. The findings also agree with McNair and Rusch, (1987) that parents are influential in the career development process, and they often wish to be included, yet, a specific role for parents is often not defined. In a situation where parental influence interferes with the career choice of adolescents, a career crisis may develop when there is a mismatch in terms of the ego strength of the child and the environmental pressures that challenge their identity. The adolescents straddle the line between childhood obedience and adult independence. But in most Africa communities, females are bound to be submissive to the patriarchal authority which does not work in their favour.

Implications of findings

The results of these findings have implications for the government and other policy makers interested in the field of education. If the government wants to bridge the gap between males and females as far as access to industrial technical education is concerned, she should be able to manipulate the variables that hinder access to technical industrial education for girls. They are social stereotypes, parental attitudes, sociocultural practices that society is promoting. The government can use sensitization strategies through the various ministries involved witheducation. They are; the Ministry of Basic Education, Secondary Education, Higher Education, Youth and Sports, Vocational Training and Employment, Scientific Research and Innovation, the ministry of culture and Medium and Small Size Enterprises. Open Door Days and other scientific expositions are important in this drive.

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