



# Policy Brief:

## Expected and Actual Skills of Young Workers in the Garment Industry of Ethiopia

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## Key Messages

- **Skills appreciated by factory managers do not match with those valued in the occupational standard.**
  1. Factory managers believe that behavioral skills, such as obedience, discipline, and punctuality, are the most valuable skills for new workers in the garment factory whereas TVET trainers appreciate garment production skills.
  2. Factory managers and TVET trainers have different perceptions of workers' skills. When asked to evaluate the same garment product, TVET trainers had a generous grading criteria, whereas factory managers tended to be very critical.
- **There is a large variation of garment production skills among factory workers. Workers with a TVET background performed better in pattern marking and comparing garment dimensions.**
  1. The skills of garment factory workers largely consist of sewing, ironing, and finishing the products. Workers do not have the skills to make patterns or compare garment dimensions.
  2. There is a large variation of workers' sewing skills. These differences tend to be related to the characteristics of the factory where they work rather than the pre-service training in TVET.

## Context

From the mid-2000s, the Ethiopian government initiated a fundamental reform of the TVET system and increased the number of intakes to TVET institutions. Two interrelated aspects are worth noting. First, the reform sets the pace for an outcome based TVET system where trainees attain occupational competence rather than following the traditional curriculum. The competency-based training is

executed following the occupation standards developed by both trainers of vocational training institutions and representatives of the industry. Another interesting point of this reform is that it pledges cooperative training between vocational training institutions and firms as a mean to increase competitiveness and facilitate the transition from school to work. The cooperative training system aims to



provide 70 percent of the training content at the factory and 30 percent of the training in the vocational institution. Regardless of such an effort, a large part of the TVET graduates are left unabsorbed into the labor market. As of 2011, the fields of training where more than half of the graduates are unemployed include woodworking and carpentry, weaving, textile engineering, and plumbing. At the same time, over 50 percent of vacancies in large and medium firms are expected to be filled by skilled production workers, against less than 10 percent for managers and professionals who hold educational certificates in liberal arts (Geiger and Moller 2015). This fact indicates the existence of mismatch between labor demands and training, both in terms of quality and quantity, and the urgent needs for adequate policy measures to mitigate it.

## Methods

The researchers aimed to capture the multiple skill dimensions of garment production workers in Ethiopia. The assessment was uniquely designed to combine the information on garment workers' production skills and the skills perceived by factory managers and trainers. While it conducted an assessment of factory workers regarding their work-related skills, it also asked the employers and trainers questions about desired levels of cognitive, non-cognitive and work-related skills. It was also designed to compare differences in skill expectations between employers and trainers, namely demand and supply sides.

During the first field work in December 2015, the team contacted 35 garment factories listed as members of the Ethiopia Textile and Garment Manufacture's Association (ETGMA) and based in Addis Ababa or its vicinity. Out of 35 contacted, 13 agreed to take part in the research and their factory managers filled in the questionnaire (Table 1). On the occasion of visiting these factories for the questionnaire survey, the researchers also asked managers to nominate three to five workers who were relatively new to the factory (between one to three years of experience) to take part in the skills assessment in January 2016. The researchers also asked them, wherever possible, to mix workers who graduated from TVET and those who did not.

On the side of TVET providers, after reviewing the statistics provided by the Federal TVET agency, the team selected

This research focuses on the textile and garment industry, because it is the fastest growing and prioritized sector in Ethiopia, and has a potential for employment growth. According to the governmental statistics (Central Statistical Agency 2013), this sector contributes nearly 1.5 percent to GDP and 9.01 percent to the country's industrial production. As for labor demand, this sector produces about one-fifth of total manufacturing employment with approximately 45,000 workers. Accordingly, the TVET institutes also assign the largest number of trainers and students to textile-related programs. In the case of Addis Ababa, in 2013, out of 9,830 TVET trainees, 2,908 were in textile-related programs, which constitutes 29.6%, followed by construction and auto mechanics (Addis Ababa City Administration TVET Agency, 2015).

five out of 27 public TVET colleges in Addis Ababa, which are the top five in student enrolment in garment production programs, including level 1 up to level 4. In these five institutes, a questionnaire for garment production trainers was administered and the total number of respondents was 30.

Table 1: Research tools and participants

Research tools	Characteristics	Participants	Number of participants
Questionnaire	(a) The demand side	Factory managers	13
	(b) The supply side	TVET college trainers	30
	(c) The workers	New factory employees	19
Skills assessment	Assessment takers	New factory employees	19
	Assessors	Factory managers	3
		TVET college trainers	3
		TIDI experts	3

On the date of the skills assessment in January 2016, 19 new employees came to the site to take part, who were also asked to fill out a questionnaire on their personal and family background, training and work experience, as well as their attitude to work. To compare the tendency of grading the workers' performance, we invited assessors of three categories with even numbers. Three TVET college trainers, three factory managers, and three experts from the training and research institution under the Ministry of Industry called the Textile Industry Development Institute (TIDI). In addition to the demand and supply side of trained workers, assessment by the TIDI experts is expected to add the perspective of the industry specialists who are in a neutral position in the labor market.

## Findings

From their empirical experiments, the researchers found evidence that:

- 1. The skills of garment factory workers consist largely of sewing, ironing, and finishing the products, but not comparing garment dimensions or making patterns to any considerable degree.** The findings indicated positive and significant associations between pattern making and comparing garment dimensions, sewing and finishing, and to a lesser extent between comparing garment dimensions and finishing. Factory workers with high skills in sewing had higher scores in finishing.
- 2. Sampled workers had a large range of skills which were learned either in TVET schools or in factories.** The largest range of skills appeared in sewing and finishing. The difference in these skills are related to the factory and the occupation within the factory. Nonetheless, workers with TVET background

performed better in pattern making and comparing garment dimensions.

- 3. TVET trainers and factory managers have different perceptions of workers' skills.** When the researchers asked TVET and TIDI trainers as well as factory managers to concurrently evaluate workers' skills, they found that TVET and TIDI trainers tend to have generous grading criteria and give higher grades to workers. On the other hand, factory managers tend to be critical, as they gave lower grades for the same garment product. The perception gaps were found to be very large in garment dimensions, sewing, and finishing, whereas pattern making was found to be the only task where the perception gaps between TVET and TIDI trainers and factory managers are small.

Figure 1: Distribution of workers' assessment scores

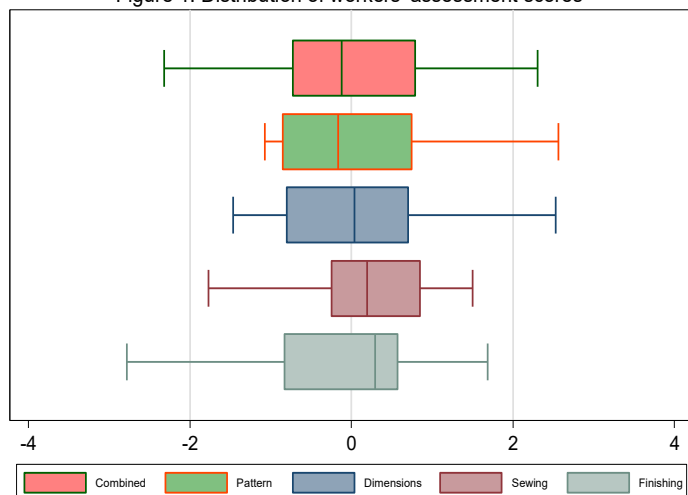
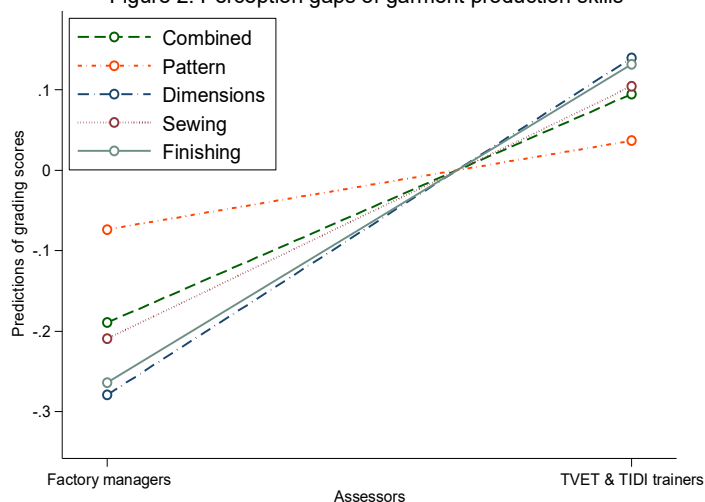


Figure 2: Perception gaps of garment production skills



The researchers identified several issues affecting the perception gaps between TVET and TIDI trainers and factory managers.

- 4. The limited interaction between TVET colleges and garment factories is notable.** Of the 30 TVET trainers who responded to our questionnaire, only 28 percent responded that they have opportunities of using machines and equipment possessed by the factories whereas 18 percent provide consulting services. Nevertheless, factory managers are not willing to make available the machines and

equipment because of lack of insurance and the possibility of misuse.

- 5. The skills appreciated by factory managers do not match the occupational standard.** Grounding their teachings on the Ethiopian occupation standard, TVET trainers expect new workers to be multi-taskers who can work along the entire garment production chain. They expect their

graduates to have higher skills in pattern making, garment dimensions, sewing, and finishing, in addition to literacy and numeracy. Their expectations contrast with those of factory managers who look for more socio-emotional skills such as obedience, discipline, and punctuality. It is, however, worth noting that these subjective skills, which are highly appreciated by factory managers, receive 8.72, 3.51, and 17.39 percent of teaching

time in the curriculum of TVET level 1, 2, and 3 respectively.

6. **Differences in garment skill perception tends to be related to the differences in the expectation of skills possessed by workers.** The researchers found that assessors with higher expectations of a certain skill gave higher grades than others.

## Implications and Recommendations for Policy

To minimize the skills mismatch between the supply and demand sides, this policy brief suggests action on skills development based on three pillars:

- Pillar 1: Skill content
- Pillar 2: Instruction and TVET institutes
- Pillar 3: The skills development system as a whole.

**Pillar 1.** The findings from this study suggest that workers do not have sufficient skills to make patterns and compare garment dimensions. The occupation standards and TVET curriculum give high weight to these skill areas, while employers do not require these skills. The large variation in the workers' sewing scores is caused largely by the factory characteristics rather than the pre-service training in TVET. There is, therefore, a definite need to:

1. Re-design the occupational standards and TVET curriculum to match employment needs for the garment factories.
2. Re-allocate the teaching hours on theory to other socioemotional and technical skill acquisition, as the proportion of teaching hours on theory is still high.

**Pillar 2.** The study finds evidence of wide variance in the score distribution among TVET and TIDI trainers and factory managers as they evaluate the same garment differently. They have different expectations for workers, which also affect their evaluation criteria. Greater efforts are needed to ensure that the criteria for

examining workers' skills are standardized among trainers, and trainers have hands-on exposure to the skills needed in the workplaces of TVET graduates. A key policy priority should therefore be to:

1. Strengthen trainers' training and make it more relevant to the actual skill requirements in the workplace.
2. Give a space for trainers to effectively take part in personal cooperative training to update their own skills.

**Pillar 3.** Factory managers expressed their indifference to the cooperative training and other forms of partnership with TVET institutes. Continued efforts are needed to:

1. Make the system more attractive to the demand side by improving the relevance of the training and the quality of skills of graduates.
2. More in-depth research is needed to identify the reasons why the cooperative training is not being implemented as intended.

### References

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