# **Chapter 4**

Vocational Education and Training (VET) and the Transition of Young Women and Men to the Labour Market in Middle-Income Countries: A Comparative Analysis Based on International Labour Organization (ILO) Surveys in Jamaica, Jordan, Peru, Tunisia, Ukraine, Vietnam and Zambia

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**Abstract** The ILO works with constituents on improving transitions from education and training to decent work. Understanding young people's pathways is thus essential for the ILO to provide policy recommendations related to VET and skills development in general.

The following pages draw from findings of School-to-Work Transition Surveys (SWTS) conducted by the ILO in 2012–2013 in 28 countries. The seven middle-income countries discussed here are Jamaica, Jordan, Peru, Tunisia, Ukraine, Vietnam, and Zambia. The surveys targeted a nationally representative sample of young people in the age bracket 15–29, and collected data on the educational backgrounds and the labour market outcomes of respondents.

In particular, this brief report focuses on the labour market outcomes of young people who have completed secondary or post-secondary VET, as opposed to secondary academic education, or university and post-graduate studies (together referred to as 'post-secondary academic education' in this report).

With the available evidence, no causal relationship can be claimed at this stage between type of education and labour market outcomes, or between specific characteristics of VET systems and successful transitions of graduates to decent work.

The data in the survey did not distinguish between work-based learning or school-based learning alone or a combination of both in VET. So no statements can be made, for example, about the usefulness of quality apprenticeships, which

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combine both learning types, in the transition of young women and men into the labour markets of these seven middle-income countries.

However, the findings represent an important starting point to orient future research on the role of education in determining young people's transitions to the labour market.

#### 1 Introduction

# 1.1 The ILO School-To-Work Transition Surveys (SWTS)

The ILO SWTS is a detailed household survey covering 15–29-year-olds. It is applied at the national level by statistics offices to generate information on the current labour market situation, the history of economic activities and the perceptions and aspirations of youth. The SWTS data are unique since they shed light on areas usually not captured by household-based surveys, such as youth satisfaction and conditions of work, wages and earnings, and the engagement in the informal economy. While not being designed as a tool to analyse national VET systems, the SWTS data can show associations between labour market indicators and educational attainment of young people. The Work4Youth Project<sup>1</sup>, a global partnership between the ILO and The MasterCard Foundation, has implemented the SWTS in more than 30 countries, twice. The indicators discussed in this paper draw from the wealth of datasets that the project has generated.

# 1.2 Conceptual Framework

The paper draws on a conceptual framework that consists of 'quality VET', 'quality employment', and a clear vision of what 'transition' to the labour market means. The two following section will address these notions in detail.

#### **1.2.1** Vocational Education and Training (VET)

A comparative analysis of the school-to-work transition of young VET graduates requires some definition. Many terms are utilized to refer VET or parts of it, such as:

<sup>&</sup>lt;sup>1</sup>Detailed information on the project, as well as all its publications and the datasets completed to date, are available upon request on the project's web site: www.ilo.org/w4y. This analysis is based on datasets of surveys completed between 2012 and 2013. Therefore the SWTS data utilized in this analysis are referred to throughout the paper as *SWTSs* 2012–2013.

- Apprenticeship programmes;
- Vocational education;
- Occupational education (OE);
- Career and technical education (CTE);
- Workforce or workplace education (WE) and workforce development (WD);
- Vocational skills development (VSD);
- Technical vocational skills development (TVSD).

The ILO, along with UNESCO, has adopted the term 'Technical and Vocational Education and Training (TVET)' to refer to those aspects of the educational process involving, in addition to general education, the study of technologies and related sciences, and the acquisition of practical skills, attitudes, understanding and knowledge relating to occupations in various sectors of economic and social life (ILO 2010). TVET includes a range of learning experiences that are relevant for employability, portability of competencies and qualifications and recognition of skills, decent work opportunities and lifelong learning in and related to the world of work.

The learning experiences may occur in a variety of learning contexts, including private and public training institutions, workplaces and informal learning settings. For the purpose of this report the term VET is used, as proposed by the organizers of the 2nd International G.R.E.A.T. Conference. Interpretation of the term, however, follows the understanding of TVET as described above.

The SWTS results presented in the following chapters of this paper need to be placed in the context of the VET systems of their respective countries. However, a full-fledged analysis of such systems and their complexities would go far beyond the scope of this paper.

In order to examine the relationship between VET and labour market outcomes, the study identifies three criteria that the authors consider to represent good quality VET. They served as important elements for the interpretation of the SWTS results. The three criteria are:

- Level of institutionalization, such as the existence and functioning of VET policies, strategies, legal framework, specialized institutions and coordinating bodies
- *Involvement of employers in decision making*, or social dialogue mechanisms at the policy level, and for planning, implementation and evaluation of VET in particular.
- Existence and scope of work-based learning schemes with a special emphasis on apprenticeship-like programmes.

#### 1.2.2 The School-To-Work Transition

The indicators produced by the SWTS are unique because of the definition of school-to-work transition that is applied. Researchers usually define the transition as the period between the exit from education (either after graduation or after an early drop-out) and the first entry into stable employment. The ILO SWTS was

designed to integrate into this definition the concept of *Decent Work*. More specifically, the SWTS framework considers a transition to be complete only when the duration of employment provides the worker with a sense of security (e.g. a permanent contract), or when the worker feels personally satisfied with the employment opportunity itself. Accordingly, there are three options that can indicate that a young person's transition is accomplished. First, the young person is employed in a stable job. Second, she is in temporary but satisfactory employment. Third, she is in satisfactory self-employment. A young person in any of these employment situations is classified as *transited*.

In line with the conceptual framework of the transition, the SWTS data offer multiple opportunities to analyse the decent work dimension of youth labour markets. This paper takes advantage of these opportunities to observe potential associations between VET and employment quality.

This paper discusses several proxies for quality of employment. The first one is the *status in employment*, which indicates whether a young person is found in wage employment, self-employment, or contributing family work (usually unpaid). The rationale behind this distinction is that not all employment statuses offer the same contractual and economic stability, or social protection. Wage and salaried work is often considered the most favourable employment option, since it is usually associated with a regular wage that may be complemented by benefits.

Another indicator frequently used to assess job quality is the *share of regular employment*, which provides an indication of job stability. Holding a regular job means that a young person has secured employment for at least one year, or is self-employed and has employees.

The *informal employment rate*<sup>2</sup> is an important indicator of job quality. Young people who are informally employed do not have access to basic benefits such as health care, leave or pension contributions. Informality also tends to be associated with lower pay, underemployment and skills mismatch (Shehu and Nilsson 2014).

In addition, this paper looks at *earnings*, since they represent an important part of a good-quality job. Often, a strong and positive correlation exists between educational attainment and earnings<sup>3</sup>. Finally, the SWTS makes it possible to measure *skills mismatch* issues<sup>4</sup>, and namely over- and under-qualification of employed youth for the job they have. Un-matching qualifications can have a negative impact on the productivity and satisfaction of workers, and should therefore be part of an employment quality assessment.

<sup>&</sup>lt;sup>2</sup>Informal employment is measured according to the guidelines recommended by the 17th International Conference of Labour Statisticians. For details, please see Shehu and Nilsson (2014).

<sup>&</sup>lt;sup>3</sup> See for instance Elder and Koné (2014) and Elder (2014).

<sup>&</sup>lt;sup>4</sup> Young workers with un-matching qualifications are either over- or under-qualified for their job. The skills mismatch between the job that a person does and their level of educational attainment is measured by comparing the international measure of occupational skills categories from the International Standard Classification of Occupations (ISCO) with the level of education in accordance with the International Standard Classification of Education (ISCED). For more details, please consult ILO (2013).

### 2 The Seven Countries Covered

Out of the 28 countries covered by the ILO SWTS, seven middle-income countries were selected for this study. The full list provided in Table 4.1. A pragmatic selection criterion was the availability of SWTS data at the time of writing. The decision to analyse data from middle-income countries from four regions was made in order to ensure a common basis for comparison on the one hand and a global perspective on the other hand.

Table 4.1 Socio-economic characteristics of the countries covered

					School enrolment,
	Population,		GNI per capita	GDP growth	secondary (%
	total(millions)	Income level*	(current USD)	(annual %)	gross)
Jamaica	2.72	Upper middle-income	5220	1.3	89
Jordan	6.46	Upper middle-income	4950	2.8	88
Peru	30.38	Upper middle-income	6270	5.8	90
Tunisia	10.89	Upper middle-income	4200	2.5	91
Ukraine	45.49	Lower middle-income	3960	1.9	98
Vietnam	89.71	Lower middle-income	1740	5.4	n.a.
Zambia	15.54	Lower middle-income	1810	6.7	n.a.

Source: author's own compilation based on World Bank (2013b) data

Table 4.2 Classification of the VET systems in sample countries

	Level of institutionalization	Involvement of employers in decision making	Existence and scope of work-based learning schemes
Jamaica	Medium	Low	Medium
Jordan	Medium	Low	Low
Peru	Low	Medium	Medium
Tunisia	Medium	Low	Low
Ukraine	Low	Low	Low
Vietnam	Low	Medium	Medium
Zambia	Medium	Low	Medium

Source: author's own compilation based on literature review

<sup>\*</sup>Income levels are according to the World Bank income classification, July 2014

Short socio-economic profiles of the sample countries can be found in Table 4.1. The World Bank classifies Ukraine, Vietnam, and Zambia as lower middle-income countries, Jamaica, Jordan, Peru, and Tunisia as upper middle-income.

An analysis based on literature review<sup>5</sup> and inputs from ILO field specialists has allowed the authors of this paper to categorise the VET systems of the seven countries in our sample according to the criteria discussed above. The results are shown in Table 4.2.

The level of institutionalization in Jamaica, Jordan, and Zambia is somewhat higher than in the other countries, with a VET Law in place, a coordinating body on national level, well-functioning quality control mechanisms, and even specific funds to financing training. Other countries lack important elements. Tunisia, Ukraine and Vietnam have no coordinating body, Ukraine suffers from a weak legal framework, and Peru's level of institutionalization is low in general, with no cohesive national policy, overlapping mandates, and thus no coherent VET system in place. Capacities to translate policies into results, however, remain week in all countries, e.g. also in Jordan, where the system still suffers from fragmentation.

Even if the social partners in most countries are represented in different VET bodies, their contribution to policy decisions is limited. Often, the Ministries are the dominant actor on the policy level, and in-depth consultation and involvement of employers' and workers' representatives in decision-making is rare. In addition, capacities of social partners are limited. Even in Tunisia, where the social partners belong to the best established and strongest in the region, they are not that well organized in the field of VET. Planning, implementation, and evaluation of VET is state-driven too, and employers' involvement strikingly low. Some good practice examples exist, like Peru's employer-led National Service of Industrial Training, but they remain isolated. Most countries recognized this problem: Jamaica, Jordan, Peru, Tunisia and Vietnam are currently taking measures to strengthen partnerships with the private sector in order to align VET with employers' needs and to improve the labour market outcomes of VET graduates.

The share of work-based learning varies considerably between the countries. While in Tunisia, a majority of VET students learn in full or part-time work-based schemes ('alternance' and apprenticeships), enterprise-based learning is marginal in Vietnam, and the programmes in Ukraine are almost exclusively school-based. Some countries have a long tradition with apprenticeship-like arrangements. Jamaica's apprenticeship Act dates back to the year 1955, Tunisia's first legal texts governing apprenticeships and related programmes are from 1957, and Zambia's

<sup>&</sup>lt;sup>5</sup>The sources analysed are: HEART Trust/NTA (2014) and World TVET Database (2014) for Jamaica; ETF (2012), ETF (2009), World Bank (2013a), World TVET Database (2014) for Jordan; Jaramillo Baanante M (2009), Rosas Shady D (2006) for Peru; Allais S (2010), ETF (2011), ETF (2009) for Tunisia; Libanova E et al (2014) and Lokshyna O (2012) for Ukraine; Martinez-Fernandez C, Choi K (2012), Specht G and Aippersbach C (2012), World Bank (2012) for Vietnam; Haan H C (2002), TEVETA (2010), World TVET Database (2014) for Zambia.

from 1964. In Jordan and Tunisia, informal apprenticeships are still important for certain sectors and occupations and served as basis for formal apprenticeships introduced in 1974 and 1993 respectively. The scope of such formal schemes, however, is limited, both in terms of scale and diversity of programmes offered. In Peru, Vietnam and Zambia, good programmes exist, but are mainly provided outside the official structures and only in certain sectors (e.g. mining or manufacturing). Often, the limited capacities of training enterprises, quality issues, and the low status of technical jobs are challenging the VET system. Recognizing the potential of apprenticeship-like programmes, several countries currently aim at improving and expanding their offers.

# 3 Survey Findings

## 3.1 Individual Characteristics of Youth in the Survey Samples

#### 3.1.1 Shares of Youth with Completed VET and Academic Education

Findings from the surveys show that vocational education attracts limited shares of youth in the countries analysed. In some cases the figures are strikingly low, as illustrated in Table 4.3 for instance, only 1.3 % of young Jordanian women have completed secondary VET, and 2.9 % of young males in Vietnam attained post-secondary VET. The data show only few outliers, such as Peru, where 25.8 % of young women are found with post-secondary vocational education.

Consistently across the countries where indicators are available, fewer youth choose VET than academic education. The VET shares at secondary level in Jamaica and Vietnam, for example, are around one-tenth of academic ones. Interestingly though, at post-secondary level the situation reverses in a few cases. In Jamaica, Peru and Zambia, university and post-graduate education are limited to relatively small shares of the overall youth population. In these cases, post-secondary VET is more likely to become an option.

#### 3.1.2 Gender

According to the results of the SWTSs, vocational education lacks gender balance. Men are more likely than women to choose secondary VET. In Jordan for example, male secondary vocational graduates are five times more numerous than female ones, and 2.4 times more numerous in Ukraine.

Figures reverse among youth who completed post-secondary VET. Young women are more represented than men in this group in four countries out of six where indicators are available. For more details, please refer to Table 4.3.

Table 4.3 Shares of youth completing secondary and post-secondary education by sex (percent)

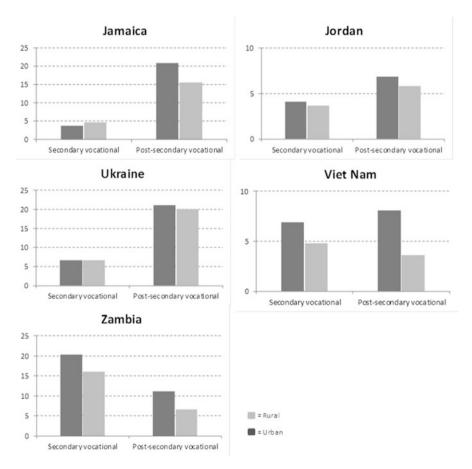
Education level														
	Jamaica	a	Jordan		Peru		Tunisia		Ukraine		Vietnam	u	Zambia	
	Z	ц	M	ц	M	Ц	M	Щ	M	江	M	Щ	M	江
Secondary Vocational	5.0	5.0 3.5	6.3	1.3	*	*	13.4 9.7	6.7	9.4 3.9	3.9	4.4 6.3	6.3	18.4	17.5
Secondary Academic	56.3	49.5	12.8	5.1	57.6	53.7	23.6	21.9	25.6	26.2	50.4	48.3	46.7	41.6
Post-secondary Vocational	15.8	15.8 21.1	5.7	7.8	24.8		*	*	23.8	17.8	2.9	6.7	6.7	7.5
University and Post-graduate	6.1 11.5	11.5	18.0	25.9	12.4	12.3	15.0	19.4	38.0	48.2	7.4	9.7	2.0	1.5
Source: author's own compilation M Male, F Female	lation based on ILO, SWTSs 2012-2013	on ILO,	SWTSs 2	2012–201	8									

\*The survey questionnaire in the specific country did not provide a disaggregation of these data.

## 3.1.3 Geographic Location

The survey data show that rural youth are less likely to complete VET than urban youth. Figure 4.1 shows that this applies both at secondary and post-secondary levels in most of the five countries where the data allow for such disaggregation.

It could be argued that these results are biased by the rural-urban gap on educational attainment. Rural youth have relatively higher chances to have completed only primary level of education or less. Therefore, Fig. 4.1 may reflect a general rural disadvantage, rather than one specifically related to VET. However, the data show that graduating from *academic* secondary school is a popular choice in rural



**Fig. 4.1** Share of youth completing VET, by level and geographic location<sup>6</sup> (percent) (Source: author's own compilation based on ILO, SWTSs 2012–2013)

<sup>&</sup>lt;sup>6</sup>Only countries where the survey questionnaire provided the required data disaggregation are shown.

Education level Jamaica Jordan Tunisia Ukraine Vietnam Zambia U R U R U R U R U R U R Secondary Vocational 3.8 4.7 4.1 3.7 13.0 9.6 1.5 2.0 16.4 24.5 20.3 16.1 Secondary Academic 50.1 56.0 13.2 19.7 25.7 18.6 6.6 6.7 6.9 4.8 46.0 | 42.4 20.9 15.6 Post-secondary 6.9 5.8 21.4 36.1 42.3 51.9 11.1 6.6

23.1

8.6 21.1

7.4

3.6

1.6

1.8

20.1

**Table 4.4** Shares of youth completing secondary education and above, by geographic location (percent)

Source: author's own compilation based on ILO

10.6

6.7 21.3 23.4

U Urban, R Rural

University and

Post-graduate

Vocational

areas. The same cannot be said about *vocational* secondary education. These results suggest that governments in the countries reviewed have invested in improving accessibility and quality of academic education for rural youth. However, they may not yet have made the same effort to upgrade secondary VET, or above levels.

#### 3.1.4 Household Income Levels

The survey enables to measure young respondents' household income levels. Table 4.4 shows that at the secondary level, academic education is consistently the preferred option in all countries and across all income levels. Once again, results are more mixed when it comes to post-secondary education. In Zambia youth who have completed post-secondary education are *more* likely to choose VET, regardless of their household income. Previous calculations on SWTS data also show that, in most countries analysed in this paper, shares of graduates increase with household income for both vocational and academic options. This means that education in many contexts is still a privilege of well-off youth. This finding applies quite consistently to academic education and less so to VET.

# 3.2 Activity Status of Youth

The following paragraphs discuss one more characteristic of VET graduates, and namely their activity status. For that purpose, the labour force participation of young people who completed VET is compared with the one of their academic education peers. If they are in the labour force, either as employed or unemployed individuals, they qualify as active youth. Conversely, if they have opted out of the labour market, for instance because they are at home with no intention to work in the future, they are defined as inactive. The share of employed and unemployed individuals out of

<sup>\*</sup>The survey questionnaire in the specific country did not provide a disaggregation of these data.

the total population defines the rate of participation in the labour force, while its inverse is the inactivity rate.

## 3.2.1 Employment

In most countries analysed, secondary VET graduates are more likely to be in employment than secondary academic graduates. The only exceptions are Jamaica and Zambia. Interestingly, the situation reverses at the post-secondary level. University graduates are more often found employed than post-secondary VET graduates in all cases but Peru, where the advantage of vocational graduates is minimal (1.1 percentage points).

## 3.2.2 Unemployment

Unemployment among youth who have completed secondary education or above is high in most countries of the sample, regardless of the specific educational choices. Table 4.5 indicates that unemployment rates exceed 20 % in five countries. The exceptions are Peru and Vietnam, where high levels of informal employment raise doubts on the quality of available employment opportunities.

A comparison between academic and VET graduates reveals that in Tunisia, graduates from secondary academic studies face significantly lower (more than ten percentage points lower) unemployment rates than their peers from VET schools. The opposite applies to Jordan. In the other countries analysed the gap between the two types of education is smaller. Among all countries taken together, the findings at secondary level are mixed. On the other hand, at the level of post-secondary education VET graduates face higher unemployment rates in four countries out of six where data are available.

**Table 4.5** Unemployment rates of youth, by educational attainment (secondary and above) (percent)

	Jamaica	Jordan	Peru	Tunisia	Ukraine	Vietnam	Zambia
Secondary Vocational	34.6	11.4	*	36.6	20.5	2.6	20.2
Secondary Academic	35.1	22.7	11.1	26.2	20.3	1.8	24.3
Post-secondary Vocational	31.5	22.6	5.1	*	14.9	12.9	22.4
University and Post-graduate	21.8	29.5	8.3	49.4	9.3	7.6	19.7

Source: author's own compilation based on ILO, SWTSs 2012-2013

<sup>\*</sup>The survey questionnaire in the specific country did not provide a disaggregation of these data.

# 3.2.3 Inactivity

The rate of youth participation in the labour force changes with type of education and with level attained. At the secondary level, inactivity rates are higher among academic graduates. In some cases the difference between shares of inactive youth among secondary VET versus secondary academic graduates is considerable. The largest discrepancy is observed in Jordan (30.4 percentage points), where it is mostly due to the large portion of non-working women in the population. Among post-secondary graduates, on the other hand, those who completed an academic track are *less* likely to be inactive. This applies to five countries out of seven analysed.

# 3.3 Quality of Employment

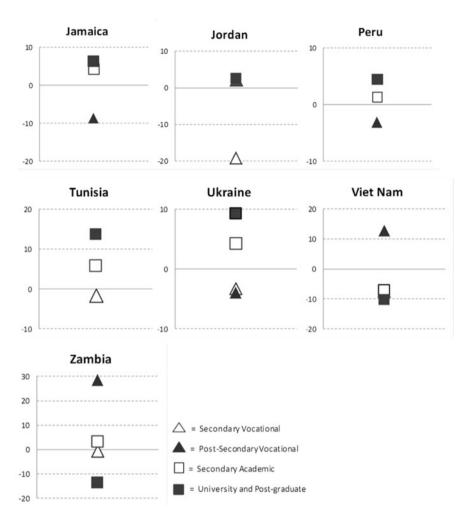
The section above has looked at the likelihood that VET and academic graduates are found employed, unemployed or inactive. This section will focus on the employed in particular. The survey data show that young people who have completed secondary VET have especially high chances to be found in employment, while the same does not apply to post-secondary VET graduates. In order to put this information in a context, we need to assess the quality of the employment opportunities that VET graduates find.

### 3.3.1 Status in Employment

Youth with completed VET do not have systematically lower or higher chances to be in wage and salaried employment, compared to youth with academic education.

It is interesting to disaggregate the indicators of status in employment by sex. Young women who completed VET have lower chances than men to find wage and salaried work. Figure 4.2 illustrates these results. A negative value in the charts indicates relatively lower shares of female wage and salaried workers. Some degree of female disadvantage is observed in all countries analysed among youth who completed VET. The opposite is true regarding academic education.

The survey results do not point to a clear pattern on self-employment. They do, however, regarding contributing family work. This refers to an employment status whereby a young person works on her own account, and usually unpaid, in a market-oriented establishment operated by a relative living in the same household. In the majority of countries reviewed academic education is associated with relatively



**Fig. 4.2** Difference between female and male shares in wage and salaried employment by educational attainment (secondary and above)<sup>7</sup> (percent) (Source: author's own compilation based on ILO, SWTSs 2012–2013)

higher shares of contributing family workers, especially at the secondary level. In Vietnam the percentage is almost four times larger than that of VET graduates in the same type of employment. Among post-secondary graduates the results are more mixed.

<sup>&</sup>lt;sup>7</sup>Disadvantage of females is indicated by a negative value (relatively lower shares of female wage and salaried workers).

	Jamaica	Jordan	Peru	Tunisia	Ukraine	Vietnam	Zambia
Secondary Vocational	62.8	86.1	*	60.0	79.5	72.7	31.0
Secondary Academic	62.3	92.6	27.9	60.8	86.2	41.0	37.3
Post-secondary Vocational	61.2	96.5	34.6	*	84.6	65.5	66.7
University and	77.3	93.5	34.2	72.4	85.5	85.5	68.8
Post-graduate							

**Table 4.6** Shares of employed youth in regular employment, by educational attainment (secondary and above) (percent)

Source: author's own compilation based on ILO, SWTSs 2012–2013

### 3.3.2 Regular Employment

In the majority of countries analysed, youth completing academic studies have higher chances to have such stable employment prospects than their peers who opted for VET.

These findings apply at the level of secondary education with few exceptions, but the gaps between VET and academic education is small. At the post-secondary level the discrepancy is more prominent. Table 4.6 shows the results for all countries in the sample.

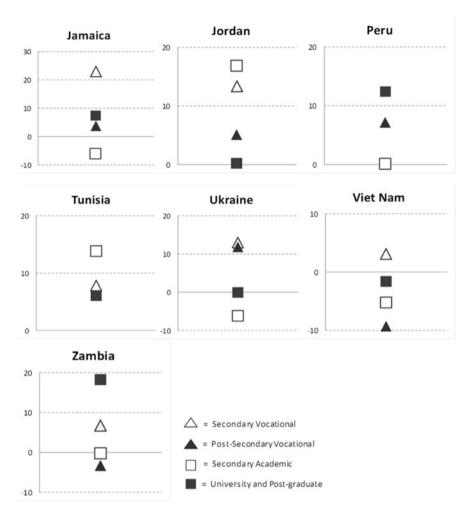
Vietnam stands out as an outlier, since 72.7 % of youth who completed secondary VET have a regular job, as opposed to only 41.0 % of graduates form a secondary academic track. However, it is important to point out that this VET advantage accounts for a limited number of youth, since only 4.4 % of young males and 6.3 % of females who are out of school have completed secondary VET in the country.

#### 3.3.3 Informal Employment

If measured through this indicator, the quality of jobs accessible to VET graduates appears relatively low. Data from the SWTSs indicate that vocational graduates have relatively higher informal employment rates at post-secondary levels, while the results are less clear at the secondary level.

If informal employment data are disaggregated by sex, they reveal a prominent gender gap at the disadvantage of women. Figure 4.3 summarizes these results. A positive value in the charts indicates higher informality rates among employed women than among employed men. Female disadvantage emerges prominently across almost all levels of educational attainment, and in all countries except Vietnam.

<sup>\*</sup>The survey questionnaire in the specific country did not provide a disaggregation of these data

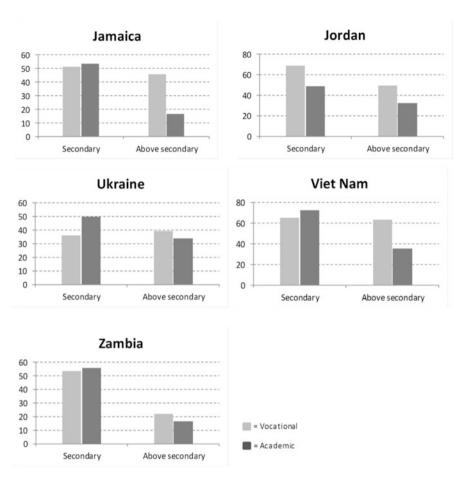


**Fig. 4.3** Difference between female and male informal employment rate by educational attainment (secondary and above)<sup>8</sup> (percent) (Source: author's compilation based on ILO, SWTSs 2012–2013)

#### 3.3.4 Earnings

The survey findings in the seven sample countries illustrated in Fig. 4.4 confirm it only with regard to academic education. In all countries, young people completing secondary academic studies can invest in post-secondary studies with some confidence that their investment will secure better earnings. The same does not apply to youth in Jamaica, Ukraine and Vietnam, where post-secondary VET graduates face

<sup>&</sup>lt;sup>8</sup>Disadvantage of females is indicated by a positive value (higher informality rates among employed women).



**Fig. 4.4** Share of employed youth earning below the average<sup>9</sup>, by educational attainment (secondary and above) (percent) (Source: author's own compilation based on ILO, SWTSs 2012–2013)

slightly *higher* chances to earn below the average than those youth who left education after secondary VET school.

A comparison between VET and academic education shows that a secondary VET degree is associated with lower chances to earn below the average. The opposite applies at the post-secondary level. In all countries analysed the lowest risk to earn below the average is associated with a university or post-graduate degree.

<sup>&</sup>lt;sup>9</sup>For the purpose of calculating this indicator, monthly wages of employees and daily, monthly or other time-specific earnings of own-account workers were converted into weekly rates for comparability. Contributing (unpaid) family workers were excluded from the calculation. Only countries where the survey questionnaire provided the required data disaggregation are shown.

#### 3.3.5 Skills Mismatch

In the five countries where data disaggregation is available, employed youth who completed VET have relatively more chances to have a job that does *not* match their qualifications. With few exceptions, shares of employed youth un-matching skills are lower among academic graduates. In some cases the difference is significant. For instance in Jordan, youth who completed post-secondary VET have three times more chances to face skills mismatch issues than graduates from university and post-graduate studies. These results are illustrated in Fig. 4.5.

It is interesting to notice that relatively few employed VET graduates feel that their education is relevant to their jobs. The survey questionnaire includes a question on young workers' perception in this regard. The answers are shown in Fig. 4.6. Young people with completed secondary VET are a lot less satisfied about the relevance of their education, vis-à-vis their academic education peers. Across countries, gaps range from 5.2 percentage points in Jordan to 49.5 in Jamaica. The results are more mixed at the post-secondary level. Taken together, all results point at a generally low alignment between learning content and labour market requirements. Even among academic, the highest share of satisfaction is barely above 50 % (in Jamaica).

#### 3.4 Youth Transitions to the Labour Market

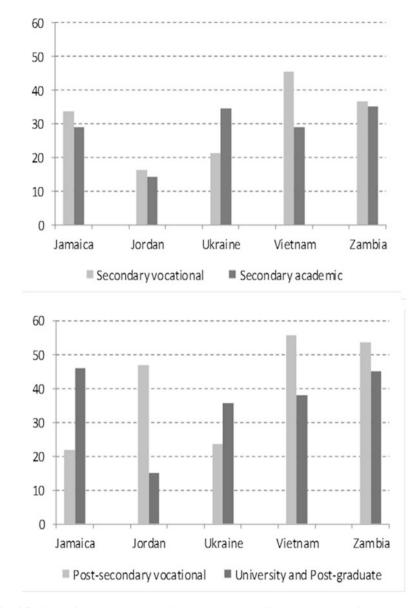
At the level of secondary education, three out of five countries with available data have larger shares of transited youth among VET graduates. However the situation totally reverses at the post-secondary level. Youth graduating from university or post-graduate studies have better chances to complete their transitions in all five countries where data disaggregation is possible. Figure 4.7 illustrates the survey findings.

#### 4 Conclusions and Recommendations

# 4.1 Summary of Survey Findings

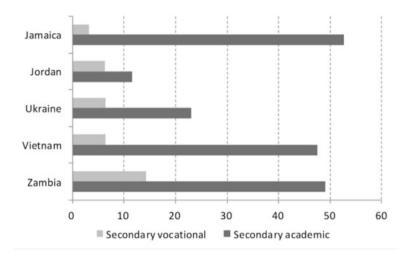
The indicators calculated from the 2012–2013 SWTSs in Jamaica, Jordan, Peru, Tunisia, Ukraine, Vietnam, and Zambia point at the following findings:

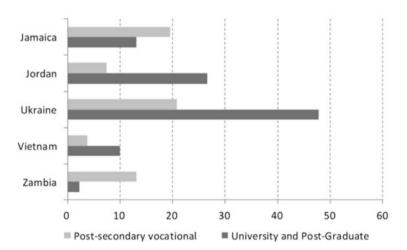
- Characteristics of Youth in the Sample VET attracts limited shares of youth in the countries analysed, and women are particularly underrepresented among young people completing secondary VET. Youth in urban areas are more likely to complete VET than their peers in rural areas.
- Activity Status of Youth In most countries analysed, secondary VET graduates are more likely to be in employment than secondary academic graduates.



**Fig. 4.5** Share of employed youth with un-matching qualifications by type of education completed (secondary and above) and country (percent) (Source: author's own compilation based on ILO, SWTSs 2012–2013)

Interestingly, the situation reverses at the post-secondary level. Regarding the risk of unemployment among graduates, findings are mixed at secondary level of education. At post-secondary level on the other hand, unemployment rates are higher among VET graduates in the majority of countries analysed.

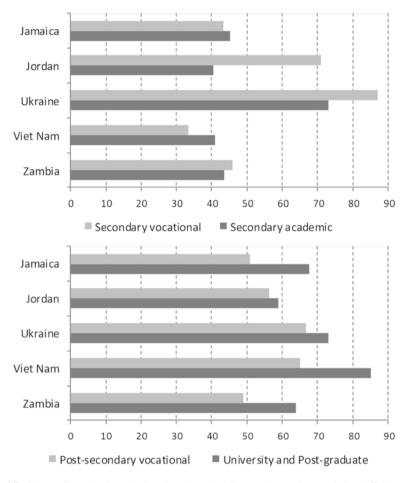




**Fig. 4.6** Share of employed youth by educational attainment (secondary and above) who feel that their education/training qualifications are relevant to their jobs<sup>10</sup> (percent). (Source: author's own compilation based on ILO, SWTSs 2012–2013)

Quality of Employment – This dimension is investigated through several indicators. Youth completing VET have higher chances to be found in *irregular employment*, and face higher informal employment rates at post-secondary levels (while the results are less clear at the secondary level). In addition, a disaggregation of all indicators by gender shows apparent gaps on employment quality. For instance, young women who completed VET have lower chances than men to

<sup>&</sup>lt;sup>10</sup>The survey questionnaire in Peru and Tunisia did not provide a disaggregation of all data.



**Fig. 4.7** Share of transited youth by educational attainment (secondary and above)<sup>11</sup> (percent). (Source: author's own compilation based on ILO, SWTSs 2012–2013)

find wage and salaried work and face higher informal employment rates. When it comes to earnings, a secondary VET degree is associated with lower chances to earn below the average, while the opposite applies at the post-secondary level. Finally, employed youth who completed VET have relatively more chances to have a job that does *not match their qualifications*. In addition, relatively few employed VET graduates feel that their education is relevant to their jobs.

• *Transition* – Among young people who have completed secondary education, a vocational track is associated with higher chances to have completed the transition. However, the situation reverses at the post-secondary level of education.

<sup>&</sup>lt;sup>11</sup>The survey questionnaire in Peru and Tunisia did not provide a disaggregation of all data.

### 4.2 Conclusions

The findings of the SWTSs allow the following conclusions:

- Share of Youth in VET VET attracts limited shares of youth in the countries analysed, with women being particularly underrepresented. This suggests that secondary VET poorly caters for the needs and interests of youth, and especially female students. Indeed, in most countries analysed, the offer is limited, both in scale and variety, the quality of the programmes insufficient, and the status of technical jobs low. In addition, there is a clear urban-rural gap in completing VET, suggesting that accessibility and quality of VET may be higher in cities, and make urban youth more likely to opt for VET and complete it.
- Labour Market Outcomes of VET Graduates No clear pattern can be observed with regards to the labour market outcomes of VET graduates compared to their academic peers. Their situation is generally better when it comes to the likelihood to be in employment or to have completed the transition, and the lower chances to earn below the average (these results only apply to the secondary level). However, employed VET graduates have relatively more chances to have a job that does not match their qualifications. In addition, relatively few feel that their education is relevant to their jobs. This could at least partly be explained by the lacking labour-market orientation of VET due to limited employers' involvement in the countries analysed.
- Secondary vs. Post-Secondary VET Interestingly and surprisingly, labour market outcomes of VET graduates significantly differ between the secondary and post-secondary level. While the findings for the secondary level are often mixed, the results for the post-secondary level are relatively clear. Contrary to the expectations and the results concerning the academic track, a higher educational attainment in VET does not lead to improved labour market outcomes. On the contrary, the situation of post-secondary VET graduates (compared to their academic peers) is generally worse than the one of secondary VET graduates (compared to their academic peers), e.g. with regards to the likelihood to be employed, the risk of unemployment, the chances to have completed the transition, the chances to be found in irregular employment, the informal employment rates and the chances to earn below the average. This significant difference in labour market outcomes on secondary and post-secondary level cannot be explained with the data available. This is particularly true, because experience from countries with strong VET systems show, that there is a high demand for post-secondary VET graduates as they are - with their specific and market relevant skills - an important factor to increase the productivity of the economy. One might therefore speculate that post-secondary VET in the countries analysed is of particularly low quality, and a last resort for those youth who could neither find employment after secondary VET nor follow the academic track.
- VET Quality The findings of the seven surveys clearly show that the quality of
  a VET system is crucial to realize its potential to contribute to a healthy labour
  market and to young people's smooth transition from school to work. The authors

are – confirmed by ILO experience – convinced that good quality VET is based on strong institutional and policy frameworks, well-functioning social dialogue mechanisms, employers' involvement in planning, implementing and evaluating VET, and the existence of work-based learning schemes, such as quality apprenticeships.

With the available evidence, however, no causal relationship can be claimed between type of education and labour market outcomes of youth. In order to identify characteristics of a VET system conducive for a successful transition into decent work, more detailed data would need to be gathered.

One relatively easy way would be to adapt the ILO SWTS methodology accordingly as in the actual format the only distinction of VET refers to secondary vs. post-secondary education. It is therefore suggested to include, for instance, questions concerning the ratio of school-based to work-based learning, the effective combination of both, such as in quality apprenticeships, or the duration of the attended programmes.

### References

- Allais, S. (2010). The implementation and impact of National Qualifications Frameworks Report of a study in 16 countries. Geneva: International Labour Office.
- Elder, S. (2014). Labour market transitions of young women and men in Asia and the Pacific, Work4Youth publication series. Geneva: International Labour Office.
- Elder, S., & Koné, K. S. (2014). Labour market transitions of young women and men in sub-Saharan Africa, Work4Youth publication series. Geneva: International Labour Office.
- ETF. (2009). Comparative analyses of work-based learning programmes for young people in the Mediterranean region. Torino: European Training Foundation.
- ETF. (2011). Social partners in vocational education and training in the Southern Mediterranean. Torino: European Training Foundation.
- ETF. (2012). Torino Process 2012: Jordan. Torino: European Training Foundation.
- Haan, H. C. (2002). Training for work in the informal sector New evidence from Eastern and Southern Africa. Torino: International Training Centre of the ILO.
- HEART Trust/NTA. (2014). Organization site. www.heart-nta.org. Accessed Jul 2014.
- ILO. (2013). Global employment trends for youth 2013 A generation at risk. Geneva: International Labour Office.
- ILO. (2010). Teachers and trainers for the future Vocational training in a changing world. Geneva: International Labour Office.
- Jaramillo Baanante, M. (2009). Skills development policies in Peru and the changing role of the international cooperation. Paper prepared for the NORRAG Conference on Policy transfer or policy learning – Interactions between international and national skills development approaches for policy making, 25–26 June 2009, Geneva.
- Libanova, E., Cymbal, A., Lisogor, L., Marchenko, I., & Iarosh, O. (2014). Labour market transition of young women and men in Ukraine, Work4Youth publication series. Geneva: International Labour Office.
- Lokshyna, O. (2012). Analysis of the system of vocational education and training in Ukraine in the framework of the "Torino Process". Torino: European Training Foundation.
- Martinez-Fernandez, C., & Choi, K. (2012). Skills development pathways in Asia Employment and Skills Strategies in Southeast Asia Initiative (ESSSA). OECD Local Economic and

Employment Development (LEED) Working Papers 2012/12. Paris: Organisation for Economic Co-operation and Development.

Rosas Shady, D. (2006). *Impact evaluation of PROJoven Youth Labor Training Program in Peru*. Office of Evaluation and Oversight, July 2006.

Shehu, E., & Nilsson, B. (2014). Informal employment among youth – Evidence from 20 school-to-work transition surveys, Work4Youth publication series. Geneva: International Labour Office.

Specht, G., & Aippersbach, C. (2012). Concept paper on business sector involvement in TVET delivery and governance in Vietnam – current situation and policy implications. Hanoi: Vietnamese-German Development Cooperation.

TEVETA. (2010). TEVETA profile 2010. Lusaka: Technical Education, Vocational and Entrepreneurship Training Authority.

World Bank. (2012). SABER country report 2012, Vietnam Workforce Development. Washington, D.C.: The World Bank.

World Bank. (2013a). SABER country report 2013, Jordan workforce development. Washington, D.C.: The World Bank.

World Bank. (2013b). World development Indicators. http://databank.worldbank.org/data/download/WDI-2013-ebook.pdf. Accessed Mar 2015.

World TVET Database. (2014). Paris: UNESCO. http://www.unevoc.unesco.org/go.php?q=World+TVET+Database. Accessed Jul 2014.

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