• Self-reporting items are currently still the most useful in terms of cost-benefit in the field. Further development and innovation towards better measures of capturing skills beyond self-reporting are still required to reduce the limitations of the current levels of subjectivity in their use.

Overcoming the challenges
A range of innovation in instrument design has been developed to overcome some of the challenges:
• Anchoring vignettes are used to reduce cultural differences in response styles. They ask participants to rate other people’s behaviour in a given scenario before rating their own. The data on the ratings on other people is used to understand participants’ individual response style.
• Situational judgement tests are used to reduce errors created through participants giving socially desirable or deliberately wrong answers. The tests develop a scenario and ask the participants what they would do in this given situation. They have been found to be predictive of future success in employment and are a better predictor than either cognitive scores or personality tests.
• Computer-based assessment is the use of virtual reality/serious games testing of life skills. Nevertheless, most computer-based testing of skills does not fulfill the potential of the technology and ends up as an online version of a paper and pencil test. The greatest barriers to achieving the technological potential in skills testing are the huge costs involved in developing a believable virtual environment to perform and demonstrate skill proficiency and the difficulties in developing the necessary methodologies to make use of the mass of data collected within the virtual environment created.

Future directions
The ultimate objective of improving the measurement of life skills is to facilitate the integration of life skills into education systems through curricula and assessment (what is not tested is not taught) and to develop a better understanding of the level of life skills that has been acquired in order to enhance the learning and life outcomes for all children and young people.

Despite the existing challenges regarding measurement of life skills, recent innovation and development in the field suggest that it is possible. Concerted effort from policy makers, practitioners and researchers is required to integrate life skills into education systems and non-formal learning settings and to collaborate to generate the global knowledge and evidence on how to effectively integrate and measure life skills.

The LSCE Measurement Instrument, Measuring life skills in the context of Life Skills and Citizenship Education the Middle East and North Africa, is a combined effort of UNICEF and The World Bank to support the development of a new instrument to measure life skills, as outlined in the LSCE Framework. The instrument aims at measuring the current state of play and the distribution of life skills of students within national education systems. It should inform education decision makers and practitioners on the nature and scope of potentially useful education interventions, and the design of effective policies and programmes to enhance life skills. When finalized, the measurement instrument will provide a standardized approach for assessing life skills proficiency targeting the lower-secondary age group.

Teaching and learning life skills, when done effectively, are incredibly important for empowering children and young people to achieve success in education, employment and personal goals and to enable them to have a say in decisions that affect their lives. In today’s complex, fast changing, global, digital and often challenging environment, life skills are widely considered a necessity so that children and young people, regardless of their background, can survive and thrive. Nevertheless, to date, few education systems have integrated life skills into their education systems. Some of the reasons for this are challenges concerning the 1) lack of knowledge as to what life skills are, 2) how they can be taught and learnt, and 3) how they can be measured, assessed and evaluated.

The 2019 UNICEF-World Bank publication, Measuring life skills in the context of Life Skills and Citizenship Education the Middle East and North Africa, strives to answer these questions through a review of available instruments for measuring life skills, and reflects on how life skills can effectively be taught.

1. What are life skills?

- Life skills are transferable skills that enable individuals to deal with everyday life, and to progress and succeed in school, work and societal life.
- They are comprised of skills, attitudes, values, behaviours and domain-based knowledge which need to be applied in harmony with each other.
- They can be learnt throughout life though there are optimal ages when interventions targeting specific skills are most likely to be effective.
- Life skills are frequently defined in terms of the empowerment that they offer individuals in their daily lives and are also understood in terms of their social benefits and their contribution towards societal change.
- The boundaries between the different life skills are fluid, with each having a close relationship and sometimes overlapping with other life skills.
- Each life skill has a number of sub-constructs and performing a life skill requires several processes or steps to complete.

The Life Skills and Citizenship Education (LSCE) Initiative represents a community of practice that brings together a variety of international and regional organizations, ministries of education and other institutions responsible for or concerned with the status of education across the countries in the Middle East and North Africa (MENA).

The current partners of the LSCE Initiative are the United Nations Children’s Fund (UNICEF), Arab league Educational, Cultural and Scientific Organization (ALECSO), Aflatoon International, the Arab Institute for Human Rights (AIHR), Birzeit University (BZU), Deutsche Post DHL Group, the International Labour Organization (ILO), the International Youth Foundation (IYF), Mercy Corps, the Norwegian Refugee Council (NRC), Save the Children, the United Nations Educational, Scientific and Cultural Organization (UNESCO), the United Nations Population Fund (UNFPA), the United Nations Refugee Agency (UNHCR), the United Nations Relief and Work Agency (UNRWA), The World Bank, and the World Food Programme (WFP).

2. How can life skills be taught?

There are a set of basic teaching principles that are said to be effective for the teaching and learning of life skills. These are:
- Learning through children and young people’s participation and cooperation;
- Learning through practicing life skills (simulation of real-world activities or through real-life experience);
- Learning in a safe environment (open and accepting classroom and school environment, and coherence between the values being taught and the values embedded in teaching, learning and how they are practiced in the classroom and school life); and
- Targeted strategies to support children and young people (use of explicit instructions and targeted interventions). These methods are useful for all students but are a necessity for students that have not had the chance to learn about these life skills in their home environment.

These principles need to be applied when integrating life skills into an education system and within specific interventions tailored towards teaching and learning of life skills.

3. How can life skills be assessed?

Quality measures for assessing life skills would enable education decision makers and practitioners to track current levels and distribution across target populations, identify progress of policies and programmes designed to enhance these skills, as well as to inform on the nature and scope of potentially useful interventions. In addition, these instruments would enable research to identify subgroups who need more support in the learning of life skills. Nevertheless, only limited quality assessment instruments on life skills exist and significant research and development is required.

State of the art on current instruments

- Most existing valid and reliable instruments are privately owned and not available for public use. This is particularly the case for cognitive test items.
- Some skills have received more attention in instrument development than others – with skills such as cooperation, negotiation and critical thinking having almost no existing measures that have found to be reliable and open for public use.
- There is limited use of innovation in the development of existing instruments and they are dominated by traditional self-report items.
- Most existing tools have not been tested in low-income countries or across different socio-cultural contexts.

Challenges of measuring life skills

- Multi-dimensional characteristics of each single life skill. Each individual life skill is described as encompassing multiple and distinct attributes. Multiple measures may be needed to capture the different components of a single life skill.
- The distinction between cognitive and non-cognitive aspects of life skills. Life skills contain a combination of knowledge, skills, attitudes and values with cognitive and non-cognitive elements being used simultaneously. Understanding cognitive and non-cognitive test items as being distinct needs to be reconsidered.
- Proficiency levels and benchmarking. There is little current evidence or guidance on expected proficiency levels of the different life skills in general or by age. There is not enough research and development to classify the levels of the life skills and to indicate an absolute levels or benchmark on the levels of attainment. In addition, one could question whether it is possible or even desirable to determine absolute levels.
- Measuring change. Creating instruments with the purpose to measure skill development within an individual has been identified as challenging. The literature suggests that current response scales for self-report items typically do not provide enough variation to measure change.
- Cultural differences in life skills. The cultural differences in life skills are under-researched as most measures have been developed within Organisation for Economic Co-operation and Development (OECD) countries. There is little research to indicate if life skills are performed in the same way in different countries and cultures.

The LSCE Framework includes 12 core life skills across four dimensions of learning. These four dimensions of learning should not be considered as distinct and mutually exclusive – they overlap, interconnect and reinforce one another to combine in the individual learner. These 12 Life Skills are not ‘set in stone’ but are rather meant to guide discussions, debate and adaptation at the country level, considering the different contexts and challenges in education and learning in each country. The LSCE Initiative assumes a systems and lifecycle approach. Its successful operation requires interventions that impact:

- Specific skills are most likely to be effective.
- They can be learnt throughout life though there are optimal ages when interventions targeting specific skills are most likely to be effective.
- The boundaries between the different life skills are fluid, with each having a close relationship and sometimes overlapping with other life skills.
- Each life skill has a number of sub-constructs and performing a life skill requires several processes or steps to complete.