

Twenty first century (21st) employability core skills necessary for educational technology teachers for instruction in this present age and labour market

Abstract

There are certain core skills that are expected of an educational technologist, in addition to knowledge or certification in the field. These abilities are known as soft skills. These skills should be embedded in the course outline of institutions to enable and ensure that when students graduate, the skills are instilled in them, well acquired, and captured in order for them to fit into the twenty-first century environment/labor market. It is what all industries and businesses expect from anyone who wants to work with them. When these skills are combined with knowledge and certification, the graduate can do well and succeed as an educational technology staff. And this is the purpose of this paper: to list the characteristics that make an educational technology graduate / candidate employable and competent in the field. Employable skills should be prioritized in training and acquisition.

Keywords: employability skills, technology teachers

Volume 7 Issue 2 - 2023

Abe Ezinne Chidinma, Uwadia Priscilla Onyehuikebue

Department of Curriculum Studies and Educational Technology,
University of Port Harcourt, Nigeria

Correspondence: Abe Ezinne Chidinma, University of Port Harcourt, Faculty of Education, Department of Curriculum Studies and Educational Technology, Uniport Rivers state, Nigeria, Tel 08035080638, Email ezinneabe@gmail.com

Received: March 01, 2023 | **Published:** March 14, 2023

Introduction

There are certain employability skills that are expected of an educational technologist in the twenty-first century; this century is interesting because it is preparing today for tomorrow so that it can meet global demand; that is to say, it is more than just acquiring the certificate; other skills are expected to back it up to complete you as a technology teacher, and this is what the goal of this paper is all about. Technology instructors are a group of professionals who adjust using a variety of technological tools; they are in high demand in the labour market. According to Idris, Saba, and Mustapha, those in this field lack competencies not only intellectually or mentally, but also socially, emotionally, and in other ways, resulting in poor performance of some technology teachers in their workforce because their best is insufficient. To be a competent technology teacher, certain important skills are required, and these skills are typically acquired through experience. Internship opportunities are also available.

Employability competencies/skills are defined by Mustapha and Abdulraman¹ as the knowledge, skills, abilities, behaviour, and other characteristics that an individual requires to successfully perform work roles or occupational functions. He goes on to define employability skills as the abilities required not only to obtain employment, but also to advance within an organisation in order to maximise one's potential and successfully contribute. According to the AECT² definition of educational technology, graduates are expected to master technical skills, communicate effectively, solve problems critically, be motivated, and have good interpersonal relationships. These are some of the soft skills that will help them fit in at work. The AECT Definition and Terminology Committee³ defines educational technology as the study and ethical practice of facilitating learning and improving performance through the development, application, and management of appropriate technological processes and resources.

Ethical: The definition emphasizes the importance of professionals maintaining a high level of professional conduct.²

Learning facilitation: The definition implies that the instructional solutions developed would cause or control learning.²

Improving performance: This term emphasizes the importance of assisting students in putting their educational technology skills and knowledge to use.²

Creation refers to the process of creating instructional interventions and learning environments, which includes analysis, design, development, implementation, and evaluation.²

Using includes selecting, disseminating, and institutionalizing instructional methods and materials, whereas management includes project, delivery system, personnel, and information management.²

According to Mustapha,³ employability competencies are the knowledge, skills, abilities, behaviour, and other characteristics that an individual requires to successfully perform work roles or occupational functions such as communication, writing, self-management, adaptability, time management, teamwork, decision making, critical thinking, leadership, initiative, honesty, and so on.

The employability skills and abilities of educational technology teachers are critical to their ability to cope and thrive in the workforce in the twenty-first century. The problem that this paper intends to address is having the certificate but lacking the qualities and characteristics to thrive in their various workforces. The purpose of this paper is to highlight the various skills that a technology teacher must have in order to be competent in their field, as well as the employability skills that they must have.

Employability Transferable core skill groups that represent essential functional and enabling knowledge, skills, and attitudes required in the twenty-first century workplace are known as skills.⁴ They are required for advancement at every level of employment and education.

In addition, the Conference Board of Canada, 2000. Employers are looking for candidates who can:

- 1) Recognize the significance of lifelong learning.
- 2) Effective communication (listen carefully and understand, speaks and write effectively).

- 3) Think clearly, critically evaluate, act logically, and make decisions.
- 4) Have strong mathematical skills and problem-solving abilities.
- 5) Make use of technology, instruments, and tools, as well as a computerized information system.
- 6) Gains access to and uses specialized knowledge from other fields.
- 7) Have a positive self-image and understand how to effectively and ethically manage their lives.
- 8) Maintain a positive demeanour and attitude
- 9) Personal integrity, initiative, and perseverance are required
- 10) Accept responsibility and hold yourself accountable for your actions.
- 11) Establish objectives and priorities, as well as manage their own time.
- 12) Have the ability to work well in groups and are adaptable, creative thinkers.
- 13) Involve others in their decision-making process automatically.
- 14) Consider your coworkers' suggestions and concerns.

21st-century skills are the skills, abilities, and learning dispositions identified by educators, business leaders, academics, and government agencies as necessary for success in 21st-century society and workplaces. This is part of a growing international movement centered on the skills students must master in order to succeed in a rapidly changing digital society. Many of these abilities are also linked to deeper learning, which is based on mastering abilities like analytic reasoning, complex problem solving, and teamwork. These abilities differ from traditional academic abilities in that they do not place a premium on content knowledge. Aside from academic credentials, most employers seek specific skills and characteristics in job candidates. These skills are not job-specific, but they are essential for increasing your productivity and value at work. These skills may have an impact on your ability to advance professionally.

Soft skills, work-readiness skills, and foundational skills are all terms for employability skills. They frequently improve your performance, reduce errors, and encourage collaboration with your coworkers, allowing you to carry out your responsibilities more effectively.⁵

Recruiters value employability skills because they are applicable to almost every job. They also value lifelong learning, a positive attitude, critical thinking skills, and so on. They are also much more difficult to teach than specific technical skills, making them very appealing to potential employers.

Methods for teaching employability skills

Employability skills are groups of transferable core skills that allow one to fit into the workforce of the twenty-first century. According to Carnevale⁶ in Mustapha and Abdulrahman,¹ the following skill groups are required:

- a) Reading and writing are fundamental skills.
- b) Communication abilities include speaking and listening skills, as well as problem solving and critical thinking. And creativity.
- c) Developmental skills include self-esteem, motivation, and goal setting.

- d) Interpersonal skills and teamwork are examples of group effectiveness skills. Sharing leadership and understanding organizational culture are two influential skills.

The importance of 21st century skills

- 1) Previously, high school graduation was the bar for today's students; now, the bar is college, career, and real-world success. Here are a few reasons why 21st century skills are important.
- 2) According to higher-education and business leaders, soft skills are the most important driver of success in advanced courses and the workplace.
- 3) Today's schools prepare students for jobs that may or may not exist in the future. Career readiness entails providing students with a diverse set of skills that will prepare them for the unknown.
- 4) Social media has altered human interaction and introduced new difficulties in navigating social situations.
- 5) The Internet has greatly increased access to information.
- 6) Large amounts of data must be processed and analyzed by students. Students must be taught how to apply facts and ideas to complex problems; fundamental subject knowledge will only get them so far.

According to Duszynski,⁵ the following are the top core skills that employers seek:

- a) Problem-solving abilities
- b) Communication abilities
- c) Flexibility
- d) Collaboration
- e) Time administration
- f) Organizing
- g) Application of Technology
- h) Utilization of Information
- i) Personality Traits
- j) Initiative
- k) Being in charge
- l) Thinking critically

Problem solving

Sixty-two percent (62) believe problem-solving skills are essential. What is the value of problem-solving? Businesses face a variety of challenges. Those who can deal with adversity better will thrive. Those who are less capable will ultimately fail. That's all there is to it.

Problem-solving is an important part of any business's daily operations, and it consists of the following steps:

- 1) Analyzing facts and figures;
- 2) Defining challenges;
- 3) Developing backup plans;
- 4) Evaluating processes
- 5) Developing and implementing solutions.

As a result, it's no surprise that employers are always on the lookout for people who can help them overcome obstacles and streamline processes.

In fact, problem-solving is a component of several larger skill sets. If you want to make the most of this skill, read our guides on analytical skills and critical thinking skills according to Laver and Yodanis.⁷

Communication skills

To be successful in your professional (and personal) life, you must be able to communicate effectively with others.⁶ As a result, communication skills are at the top of any employability skills list. To be an effective communicator, you must be able to do the following: Listen, empathize draw logical conclusions establish rapport adapt language to your audience act on the information you gather.

Flexibility

Change is the only constant in the twenty-first century. This is why businesses seek individuals who can quickly adapt to the ever-changing business landscape.

New technologies, new forms of competition, and new business models all necessitate quick thinking and the willingness to propose novel, untested solutions.

It is not surprising that adaptability is high on the list of top employability skills. There is one more thing, If you are open-minded and enjoy learning, you will use your mistakes to invent new, more efficient ways of carrying out your duties. This is the attitude that employers want to see.

Collaboration and synergy have become trendy terms in recent years. Collaboration is critical. Nonetheless, the importance of collaboration should not be underestimated. A well-organized team can accomplish far more than any of its individual members could. As a result, one of the most sought-after employability skills is teamwork or collaboration. According to Kenny and Brain,⁸ collaboration entails the following:

- a) Recognizing each team member's strengths and weaknesses in order to properly distribute duties;
- b) Accepting responsibility for the results; and resolving team conflicts

Administration of time

You will struggle to deliver results if you are unable to effectively plan your time. But it does not stop there.

Poor time management can lead to an imbalance in work-life balance, which can lead to professional and personal problems.

Employers don't want this to happen. As a result, one of the most important employability skills is time management. Time management is, in fact, a subset of resource management, which encompasses time, effort, and other resources. To be considered an effective time manager, you must be able to plan the use of existing resources (such as time, effort, people, and money), determine a task or project timeline, create timetables and milestones, task and personnel management, prioritizing delegation, and being self-motivated and focused. Each one of them makes you a more employable and versatile person.

Technology use

Technology has infiltrated and will continue to infiltrate all aspects of our lives. It makes no difference whether you're a data scientist,

a nurse, a secretary, a network engineer, or an investment banker. Trilling and Fadel⁹ contend that in order to remain employable, you must stay current on relevant technologies in your field Information Utilization This differs from the previous one, It is a necessary skill for employment In the twenty-first century, information is the new currency.

Employers clearly want employees who can: locate relevant information in various media, organize it meaningfully, analyze, draw conclusions, and explain it to others. Remember that the ability to use information can mean a variety of things. It could be referring to locating a single critical piece of data or creating a data-driven investor pitch deck. Personality characteristics, whether you agree with them or not: According to Carnevale,⁶ certain personality traits make you more employable than others, What is the significance of this for businesses? Because of your transferable skills and personality traits, you are an excellent cultural fit. According to this study, the top six character traits sought by employers are:

- a) Professionalism
- b) Encouragement
- c) Confidence, Creativity and Transparency

It is impossible to change your personality to become someone you are not. During your job interview, you should try to come across as enthusiastic, confident, and open.

Leadership

Finally, the ability to motivate others is essential. Management and people skills, as well as charisma, empathy, and strategic thinking, are examples of leadership skills.⁹ Leadership is a difficult skill to master, and great leaders are priceless.

Initiative

Taking the initiative entails identifying and resolving a problem, preparing for a potential crisis by taking preventative measures, capitalizing on opportunities, and remaining optimistic.⁹

It demonstrates your ability to think for yourself and act appropriately when not directed. You are a self-starter with a strong desire to succeed and a willingness to constantly develop yourself through continuous learning, which makes you valuable to any organization.

Employees who are self-motivated enough to complete tasks without being asked are valued by employers. Such employees' adaptability and courage can push organizations to innovate and gain a competitive advantage.

Thinking critically

The ability to comprehend, analyze, interpret, and draw conclusions from information is referred to as critical thinking. Employees must assess situations and solve problems in all jobs. Employees must be able to think clearly and rationally in order to make sound decisions.⁴

A technology teacher teaches students critical computer and technological skills required for both the learning process and finding a good job after graduation. It is part of the job to plan age and grade-appropriate courses, instruct students according to the approved curriculum, evaluate student work, provide feedback, and collaborate with other instructors to ensure that technology expectations are uniform across subject areas.

Conclusion

To remain in the workforce, a technology teacher must possess certain skills. These abilities are more akin to a personality or set of characteristics that a technology teacher should deliberately and consciously possess; without these abilities, gaps will exist and productivity will be low. These are essential skills in their workforce that should not be overlooked. Every employer seeks people with good manners, honesty, integrity, truthfulness, and sincerity.

In all workplaces, for example, human relationships are critical. Furthermore, when it comes to teamwork, every organisation requires someone who can adapt and collaborate effectively with others. Critical thinking and problem solving are also essential skills for the workforce of the twenty-first century; individuals must be able to think outside the box and provide relevant solutions. The value of creativity and other abilities cannot be overstated.¹⁰

Workshops and training: This field necessitates frequent trainings and programme organization in order to awaken their consciousness.

Another idea is for these teachers to attend regular seminars and sensitizations. In terms of the importance of having these skills in their workforce.

These abilities should be incorporated into the instructional and learning processes. School officials and administrators should include some relevant subjects or topics that demonstrate the importance of these skills.

Furthermore, teachers should begin teaching students about the importance and benefits of acquiring these skills before they leave the four walls of the school. Core skills for employability are essential tools and characteristics that educational technology graduates and tutors must consciously possess.

Acknowledgements

None.

Conflicts of interest

Author declared there is no conflict of interest.

Funding

None.

References

1. Mustapha A, Abdulrahman M. Employability competencies needed by educational technology teachers for effective teaching and learning in the 21st century workforce. 2015;5(5):17–22.
2. AECT. Definition and terminology committee. 2008.
3. Mustapha A. Occupational and employability competencies. 2015.
4. Overtoom. Employment skills in 21st century work place. 2000.
5. Maciej Duszyński. Employability skills: Definition and lists of examples. 2022.
6. Carnevale. Employment career success. Aeseuation.com/blog/whatare21stcenturyskills. 1990.
7. Lauer SR, Yodanis CL. The international social survey programme (ISSP): A tool for teaching with an international perspective. 2012.
8. Kenney Brian. Getting it together: sure, collaboration is good, but we need data--and we need it now. *School Library Journal*. 2007;(53)7:9(1).
9. Trilling Y, Fadel E. 21st century knowledge and skill bar. 2012.
10. Robert AR, John VD. Trends and issues in instructional technology. 2012.