## 21st century skills and the 4th Industrial Revolution

How are we doing?



Manzoor Ahmed

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Minister Sheikh Hasina recently said, "It is not only Bangladesh, the whole world will need skilled manpower...

and for that we have reformed our education system, giving priority to vocational training. She was speaking at the international conference on "Skills Readiness for Achieving SDG and Adopting Industrial Revolution 4.0" on February 2, 2020. The event was organised by the Institute of Diploma Engineers Bangladesh (IDEB) and the Colombo Plan Staff College in Manila, Philippines.

The Prime Minister has rightly indicated an important priority. The question is: how are buzzwords such as the "Fourth Industrial Revolution" understood and what is happening on the ground in the thousands of secondary level institutions across the country?

Klaus Schwab, the founder of the World Economic Forum and the organiser of the annual Davos Summit, is credited with popularising this term. As Schwab explains, the First Industrial Revolution started in the 1780s, using water and steam power to mechanise production. The Second, beginning in the 1870s, used electric power to create assembly lines and lead to mass production. The Third, starting from the 1960s, used electronics and information technology, also known as digital technology, to automate production. The Fourth Industrial Revolution (4IR) now builds on the digital revolution.

The latest Industrial Revolution blurs the lines between the physical, digital and biological spheres in an unprecedented way. The 4IR is radically different, since it is more than only a technological shift in economic

production, as the previous three were. It opens unlimited possibilities for addressing critical challenges of poverty, inequality and sustainable development. However, beyond the hype surrounding 4IR, the potentials and challenges have to be seen from the perspective of the real world, especially from the point of view of low income countries like Bangladesh where the majority of the world's people still live. The prospects and problems are spectacularly different for most people in these countries when compared to those in wealthier countries.

Over 80 percent of our workforce are employed in the informal economy, which is not regulated by worker welfare and rights standards. A third of the workforce has no education, 26 percent have only primary education and 31 percent have only up to secondary education, according to a 2017 Labour Force Survey. Over 40 percent of workers are engaged in the low-skill and low-wage agricultural sector. The concept note for the Eighth Five Year Plan (FY2021-25) that is under preparation says that the overall quality of the labour force is much below the level that is needed to achieve the planned 15 percent growth in manufacturing, to expand the organised service sector, and to facilitate the transition to an upper middle income country.

Life and the livelihoods of the majority of people in Bangladesh are largely characterised by the use of the second or even the first Industrial Revolution technologies. At the same time, ironically, most people are also touched by the third Industrial Revolution through the penetration of mobile phone technology. The features of 4IR can be found in a handful of the better educated and privileged population who benefit from or contribute to its development at home or abroad. What this means is that simultaneously, technologies and people's skills, as well as their

attitudes and aspirations, have to be lifted across the board in all four phases of industrial revolutions, starting from wherever the people are on this spectrum. This is where skills formation, the role of the education system and the relevance of 21st century skills come in.

What we call 21st century skills

Exhibit 1: Students require 16 skills for the 21st century

skills recognises the value of the foundational skills of multiple literacies, the essential tools for learning. This is the base on which the higher order skills of solving problems and thinking critically are built. Young people also have to be helped with social and emotional maturity and acquiring moral and ethical values—

21st-Century Skills Foundational Literacies Competencies **Character Qualities** How students approach complex challenges How students apply core skills to everyday tasks How students approach their changing environment Lifelong Learning

Note: ICT stands for information and communications technology

PHOTO: WORLD ECONOMIC FORUM, NEW VISION FOR EDUCATION (2015)

are not necessarily all novel, nor do they mark a clean break from what were important in the 20th century or the 19th century. There are common and timeless elements of quality and relevance for learners and the whole of society in any system of education. Education systems have always struggled to achieve and maintain these essential elements, and they have not become invalid in the 21st century.

This formulation of 21st century

the qualities of character. A lifelong learning approach has to be adopted for this. As in the case of technology adoption and adaptation, skills development and education also need to consider the perennial basic and essential elements that can respond to the diverse phases of technology, production, consumption, lifestyle and expectations in which people find themselves.

The education authorities—the two

divisions of the Bangladesh Ministry of Education and the National Curriculum and Textbook Board—are engaged in a review of school curricula in the context of 21st century challenges. What is more important than formulating the curriculum is to find effective ways of implementing the curriculum. Teachers—their skills, professionalism and motivations—are the key here. So is the way students' learning is assessed. Look at the negative backwash effects of the current public examinations—too early and too frequent; many questions on what they actually assess; and the distortion of the teaching-learning process in schools.

A good move is to start streaming students to different tracks from 11th grade rather than 9th grade, something which is under consideration now. The aim is to build a common foundation of competencies for all, and not force young people to foreclose their life options early.

Klaus Schwab had warned that we face the danger of a job market that is increasingly segregated into "low-skill/ low-pay" and "high-skill/high-pay" segments, giving rise to growing social tensions. Coping with the implications of this danger for education and skill development is a continuing concern. We cannot discuss the numerous structural and operational obstacles to necessary reforms in education and skills formation and how to deal with these within the confines of this article. But we can hardly ignore them either.

The decision-makers of today find it difficult to free themselves from the trap of traditional, linear thinking. They are too absorbed by the multiple, immediate crises knocking at their doors every day. Can they find the time and focus their mind enough to think strategically, looking at the bigger picture and with a longer time horizon, about the forces of change and disruption that are shaping our future?

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## Does art have to be objective?



SAAM HASAN

this month, Todd Phillips' *Joker* enjoyed a tremendous night at the 92nd Academy Awards, picking up a whole host of Oscars

including Best Actor for Joaquin Phoenix's virtuoso portrayal of Arthur Fleck. However, the road did not begin as sweetly for the movie; even before it ever hit theatres, criticism was flooding in regarding the violent nature of the content and how it may impact viewers.

Straightaway, it goes without saying that some movies and shows make it extremely clear what message they are trying to send, with subsequent confirmation from directors or other relevant figures. It is also sad to note that many times those messages are rather regrettable, \*cough\* Kabir Singh. However, we still live in a world where thankfully, the majority of entertainment content available to us remains unbiased with regards to their social narrative.

Going back to the first example, the initial reception may seem incredibly strange given the Clown Prince of Crime is generally seen as one of the

most violent characters in all of pop culture. But *Joker* is certainly not the first film, TV show, song or any kind of art form to be called into question for the supposed message propagated by it. This leads me to ask, is it really an obligation for movies and other forms of entertainment to explicitly tow a line of morality when it comes to the expression of its characters? Is it a movie's job to repeatedly tell you which of its people are bad and why?

Let's start by looking at a movie from the perspective of a general viewer. When you go to a theatre or start streaming something on Netflix, the idea is to experience a story that is larger than life and that leaves you on the edge of your seat. And of course, in order for that to happen, said story must be centred around interesting characters and their developments. But does interesting storytelling and intriguing characters mean they have to be good people, or that the narrative has to clearly establish who is good and why? After all, the beauty of art is often in its subjectivity. You want to be able to debate the decisions made by a character, and see how your opinion of them stacks up against those of others. Good art can never have only one way of looking at it.

And on the subject of good art, or more specifically good movies and

shows, most critics and experts agree that the best stories are the ones that do not constantly underline and reiterate the meaning behind what we are seeing. "Don't bash your audience over the head with it", as it is often said. Subtlety is arguably the most important of all storytelling elements,

viewer to decide what they find to be good and what or who they find to be bad. At the end of the day, art is a representation of the world, the whole world, which of course includes people and emotions from all parts of the morality spectrum.

Thus, whenever an individual



US actor Joaquin Phoenix poses in press room with the Oscar for Best Actor for "Joker" during the 92nd Academy Awards on February 9, 2020.

which allows plots to be deeply layered and nuanced. Hence, creative freedom and excellence often necessitate the disguising of meanings, allowing the

consumes an entertainment product, they have their own part to play in this particular seller-consumer dynamic. The seller will create their

art and present it to the consumer. The consumer must then decide on what it really means. And the question of whether or not people are able to interpret the meanings correctly and in a non-damaging way, is basically a question of whether or not people have an understanding and acceptance of what is ethically correct and what isn't.

So whether it be the Joker instigating anarchy or Ki-woo conning his way into exploiting a wealthy family, the underlying negative emotions and motives are presented as they are, for the purpose of telling the story of their characters. It is this tapestry of dark desires that made these movies such a gripping viewing experience. Similarly, even with story lines such as Clarice Starling putting everything on the line to pursue Hannibal Lecter, or Tony Stark sacrificing himself to save the universe, it is still up to the viewer to decide how much they agree with their actions and how they think the characters could have achieved their goals in a different way better suited for everyone.

Art is meant to depict life in ways that we could not have thought of otherwise, but what it means and the message it sends, is also up to the audience.

Saam Hasan is a pop culture writer for

Is it really an obligation for movies and other forms of entertainment to explicitly tow a line of morality when it comes to the expression of its characters?

## QUOTABLE



**IRIS MURDOCH Novelist and Philosopher** (15 July- 1919- 8 February 1999)

Our actions are like ships which we may watch set out to sea, and not know when or with what cargo they will return to port.

## **CROSSWORD** BY THOMAS JOSEPH

**ACROSS** 1 Kaaba setting 6 Ancient Mexican 11 Flynn of film 12 Molar, for example 13 "Go ahead, ask" 14 Instructional kind of book 15 Fencing sword 17 Eat late 18 Waste container 22 Gambling city 23 Worries 27 Higher than 29 Towel material 30 Comicstrip makeup 32 Glimpsed 33 Drake's genre

35 Bit of humor

38 Aspirin target

39 Highway ramps 41 Washington's successor 45 Pond growth 46 Olympics award 47 Rider's straps 48 Bitter humor

**DOWN** 1 Got together 2 Make mistakes 3 Weep 4 Visits 5 First Hebrew letter

6 Essentially 7 Menagerie 8 Pulls along 9 Words from Caesar 10 Pork serving

16 Flow out 18 Snare 19 Singer McEntire 20 Shortly, in poems 21 Fails 24 Metal sources 25 Zwei follower

26 Agreement, of a sort 28 Passes 31 Relaxing resort 34 Home of the Marlines 35 Bike part

36 Car bar 37 Leslie Caron movie 40 Light brown 42 Commotion 43 Fellow 44 Cunning

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YESTERDAY'S ANSWERS

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