

Students' Social Networking, Human-Artificial Intelligence Interface Skills and Human-Centered Behaviour Intentions in Lagos State, Nigeria

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Abstract: The much expected balance in the use of artificial-intelligence systems lie with the creation of a human-centred society, this also is the thrust of era 5.0. However, this can be actualised with possession and utilisation of special interactive skills. Based on this, the study examined non formal education students' level of social approval of basic artificial intelligence (AI); the relationship between social networking and students' human-AI interface skills (creativity and analytical) as well as the relationship between human-AI interface skills and human-centred behaviour intentions in 5.0 era. The descriptive survey research design was used, with one research question and three hypotheses tested at 0.05 level of significance guiding the study. A total of 520 participants were derived using purposive sampling techniques from six Adult education centres in three randomly selected local government areas in Lagos State. The instrument used for data collection was a self-designed and validated questionnaire with reliability coefficient of 0.70. Data collected were analysed using means, standard deviation, Pearson Product-Moment correlation coefficient and Regression analytical statistical tools.

Keywords: social approval, human-artificial intelligence, human-centred behaviours, analytical skills, creativity skills

1. INTRODUCTION

The world is ever in a dynamic state, with man's burning desire for a more comfortable and convenient life propelling technological advancements that more often than not, set the course for major changes in human behaviours and societal evolution. It may not be wrong therefore, to state that artificial intelligence (AI), one of the enabling technologies in our society may be affecting many aspects of man's activities and behaviours in ways that may not be fully understood, and may not have been studied extensively. AI describes (typical digital) artifacts that extend any of the capacities related to natural intelligence [1]. In line with this, it was summed up that the effect of the induced technological advancements is known as human technology co-evolution [2]. This idea was enriched when it was added that over time, a chronological order of man's progression has been established, beginning with (Society 1.0) the hunting society, to (Society 2.0) agricultural society, (Society 3.0) industrial society, (Society 4.0) information society, and the latest being (Society 5.0), the emerging super smart society [3].

As a corrective initiative, a human-centered society has been recognised as one that will take shape due to social

reform, the aim will be to augment humanity through a balance of economic advancement (in goods and services) and the resolution of social problems (access to all human needs regardless of age, gender, locale or language) within a system that highly integrates cyberspace and physical space [4]. It is the idea of establishing this balance and which should be in the interest of all humans beings that has led to recognising the emerging Society 5.0 as a human-centred society; therefore, the defects of the previous society are matters that the future society is seeking to correct. Society 4.0, the immediate system that Society 5.0 is evolving from was anchored on information. In a simplified language, the term 'information society' conveys the idea that each of the systems in the society collects data, processes them with sophisticated IT systems such as AI, and then applies the results in a particular real-world environment, however, in the emerging Society 5.0, the vision is to have a set of interconnected systems that will be operating throughout the entire society in an integrated fashion [4].

Bradshaw et al.; Gorecky et al. [5; 4] observed that in Society 4.0, social robots and other artificial intelligent beings were used for narrowly defined work-rated tasks in appropriate workplace environments by only a few

professionals for maximisation of value in industrial and organisational settings. In contrast, Society 5.0 will operate with real world 'big data' that will be gathered from various systems (energy, transport, medical care, shopping, education, work, and leisure), after analysing them by AI, the output will be fed to human beings in user-friendly forms and by so doing, ordinary people (AI nonprofessionals) will incorporate these entities into everyday activities, routines, and networking, more so, in the most intimate aspects of their lives [2; 5; 4]. Earlier, Government of Japan [5] [observed that the envisioned human-centered society will operate with human members that will be surrounded with rapidly increasing number and kinds of social robots, artificial agents, and other artificially intelligent entities who will not exist as passive tools that are meant to carry out the instructions of human operators as they will learn, decide, and act for themselves in increasingly autonomous ways. As such, man will need to understand the working mode of these artificially intelligent entities, their applications, and differences from human intelligence.

As much as the vision of carrying every one along in the emerging human-centred society is a noble one, it is looking more like a tall dream, especially when we consider the fact that most people in the developing world have very little exposure to complex AIs and contact with entities that are powered by AI technologies. This may as well mean that even though we live in a time of rapidly expanding technological advancements and AI is getting more and more sophisticated, the developing countries may stand the risk of not being able to catch up with the rest of the world as quickly as would be expected. It seems appropriate then, to emphasise on the likely consequences of insufficient and rudimentary exposure to AI and their augmented entities. This deficiency can affect the understanding of the working capacity of AI and the solutions they offer to human beings, but beyond this, it is likely that it can affect the level of social approval of AI generally, especially, among the not so well educated members of our society. Social approval is a term that is used to denote positive appraisal and acceptance of someone or something (a behavior, trait, attribute, or the like) by a social group, its manifestation comes as compliments, praise, statements of approbation, and such others [6].

Interestingly, most people are using smart phones, a form of domestic robot [1], computers and other devices. With access to internet, many people are as well, becoming more and more inclined to using social media and participating in social networks; however, the effects of such actions may be more pervasive than imagined. Where AI (the augmentation of human intelligence) is already an integral part of today's social media functioning, there are indications that the social actors, who may have come together because they have a common interest have been adapting to the various forms that AI operate behind the scene. For example, some of the platforms serve users contents or videos of interest, offer facial recognition or detection of faces in posted pictures, recommend user's tag options, suggest people that may be known by the user, identify visuals, auto-correct when typing and such others. It seems logical, therefore, to assume that basic human-AI interface skills (such as creativity and analytical) can be learned from social networking and

platforms. It is looking more like that with prevalence and intensity of hype about (advanced) AI [7], many people may not have realised that they are already interacting habitually with AI. There are many other AI powered systems which ordinary people have been interacting with, some of them are: traffic light guides, web information search engines, google maps, ride sharing apps (like Bolt, Uber), E-mail spam filter and categorisation, plagiarism checks, mobile banking apps and such others [7]. The aforementioned categories of AIs are as well, the focus of this study.

By design, AI and other technologies provide special capabilities and solutions, but the complementary role of human capabilities that are attuned to their usage are equally important. The emphasis here is that human-AI collaboration is optimised when the strengths of AI (speed, scalability, quantitative capabilities) are utilised in complementary and augmenting capacities to human strengths (leadership, teamwork, creativity, social skills) [8]. This may be suggesting that the secret to maximising human-AI collaboration lies in man's creative and analytical qualities. It may also mean that human actors in in the emerging Society 5.0 should first, understand what AI can do better than man and second, there is a need to apply human creative skills where the capability of AI is limited. In this light, AI and usage offer solutions to man's problems that in effect should lift humans to being better creative beings. Little wonder then that it was emphasised that basic (broad) AI literacy, whose aim is to grant all ordinary human participants an understanding of the working mode of AI and ability to form opinions about their roles in our lives, industries, and communities is a necessity while the high (narrow) level that involves deeper learning of data science, algorithms, and programming is essentially for data scientists and technologists [9]. Man's basic AI literacy acquisition efforts covers the gaining an understanding of AIs technology capabilities and strengths (content) as well as the context-dependent nature of this attribute, an understanding of a need for actions that may involve applying the technology in some context-specific way and imagining new ways to apply and benefit from AI technology [9]. AI analytical skill is however, conceptualised in this study as man's quality of questioning and clarifying on AI offered solutions based on an inclination of being holistic and on the need to form opinions or take decisions based on an understanding of the limitations of its capacity. Also, AI creativity skill is conceptualised as man's quality of augmenting AI and solutions with real world peculiar realities or situations as well as the application of personal resources like self-values and emotions for derivation of appropriate, creative outputs. They seem to be skills that will guarantee appropriate and effective utilisation of AI, the solving of human problems in the community, and ultimately, the realisation of the much desired human-centred society.

Without much argument, man is the most important participant in the emerging Society 5.0, this position seems to attract an additional responsibility of working voluntarily and collectively to initiate and sustain the quality of 'human-centredness'. The agreeing submission is that the vision of Society 5.0 requires us to reframe two kinds of relationships: the relationship between technology and society and the

technology-mediated relationship between individuals and society [4]. A cursory look appears to be suggesting that first, technology-mediated relationship between individuals and society appears to be a green area for research. In addition, a Technologically-induced relationship between individuals and the society seems to suggest a need for mechanisms that can control man's behaviours through roles and responsibilities of cooperation, mutual respect for other human participants, the upholding of ethical or moral values, abidance with AI policies that are formed by government or other regulatory bodies and such others are equally important in the emerging Society 5.0. Secondly, there seem to be few studies in the literature with focus on relationship among human AI interface skills (creativity and analytical) and human-centred behaviours in the society. These are the major concerns of this study. There are however studies with focus on relationships among creativity or analytical skills, workplace behaviours and outputs. For example, the investigation of the correlation between perceived analytical skills, employment relations and future workspace [10]; the exploratory study of the potentials of AI as a support in strategic organisational decision making, that is, group decision making under uncertainty [11]. The next section of this paper presents an overview of literature on social acceptance of AI, social networking and impact on AI-human interface skills, and relationship with human-centred behaviour intentions. This is followed by methodology, result presentation, discussion of findings, conclusion, and recommendations.

2. OVERVIEW OF LITERATURE

The online survey that was conducted by Nomura Research Institute [12] showed that there were differences in terms of knowledge, acceptance, and usage intentions of robots and other AI entities among customers in the US, Japan, and Germany. Furthermore, a comparative evaluation showed that US had the highest level of social acceptance for robots and utilisation both at home and in retail shops while Japan preferentially used robots in their industries and not in their homes, the reason for this was the lack of sufficient knowledge about robots (Nomura Research Institute [12]).

The online survey whose aim was to investigate the relationships among experiences with and knowledge of functions of three types of domestic robots and acceptance of these robots, intention to use and trust yielded results that showed that acceptance of the robots differed by type of robot; and the influence of these factors on acceptance of the robots also differed depending on the robot types [13].

An investigation of the influence factors (health, convenience comfort, sustainability, safety security and personal innovativeness) in a Unified Theory of Acceptance and Use of Technology (UTAUT2) model on behavioural intention and use behaviour for products containing AI in an everyday life environment was conducted [14]. Findings of that study showed that except for safety security, all additional factors to UTAUT2 model played a relevant role in explaining behavioural intention and use behaviour of products containing AI, thus, the applicability of an established acceptance model for products that incorporate AI was not

only validated but an extension by the understudied five additional influencing factors was established [14]. Relatedly, Lee et al.; Kochigami et al.; Reich and Eyssel [13] in their separate studies examined and found a significant influence of cultural difference, age, human gender, occupation, interest in science and technology, and dispositional correlates of anthropomorphism on social acceptance and attitude towards service robots in domestic environments.

The survey of telecom companies in China was designed to examine the impact of success factors (the external environment, organisational capabilities, and innovation attributes of AI) on AI adoption [15]. The results showed first, a direct relationship between compatibility, relative advantage, complexity, managerial support, government involvement, and vendor partnership on AI adoption. It was also found that managerial capability influenced other organisational capabilities and innovation attributes of AI, but it was indirectly related to AI adoption while market uncertainty and competitive pressure were not related to AI adoption; all the external environment factors positively influenced managerial capability. This study [15] however, focused on factors that could enhance the adoption of AI in organisations and not on individual acceptability of AI or in social networks.

An investigation of how adult learners could make use of digital media (smart phones and social media) as a platform for non-formal learning [16] adopted a qualitative method of inquiry where social media learning tools were used to augment physical classroom learning activities. The participants' interview responses showed among others that the non-formal teaching tools facilitated peer-interaction and peer-critique; furthermore, a post-course evaluation where the majority of students agreed that the non-learning platforms employed in the module had reinforced their understanding of the course materials, provided insights into their strengths and weaknesses, and sustained their learning interest through the multimedia tools used [16].

The importance of context in AI design and usage was highlighted in an exploratory study where seven factors (falsifiability and incremental deployment, safeguards against the manipulation of predictors, receiver-contextualised intervention, receiver-contextualised explanation and transparent purposes, privacy protection and data subject consent, situational fairness, and human-friendly semanticisation) were identified as factors that were capable of making AI socially good but not sufficiently because best practices require that design considerations should align with context and strategy [17].

A library research yielded evidence that recent developments in AI signal a new relationship between human and machine and as well, among other benefits, an opportunity for man to be trained to be creative in a specific domain [18]. While hinting about a likelihood of evolution of combined human and computer creativity and concerns about the pattern that it will take, it was observed that AI has created a new way to perform experiments on creativity, being that AI makes it possible to simulate complex environments which can be studied with a creative application of the scientific method by human beings, and a ground for man to attempt to find the laws of a simulated world [18].

The input of human creativity in artificial intelligence-education (AIEd) system from the perspective of integration of human and AI capabilities and for the purpose of adaptation was highlighted through a framework modification [19]. Unlike previous frameworks in the literature, the newly synthesised one showed the possibility of human-AI hybrid adaptability in AIEd systems. For example, the human creative inputs could take forms like organising prior work through the lens of human- AI hybrid adaptivity by the facilitators (teachers, peers), envisioning of new possibilities for human- AI hybrid approaches in education, and as well may involve working in alignment with context specifics such as when it necessary to override decisions made by AIEd technologies [19].

The results of the study that was not directly set to investigate the effects of human-AI analytical skills on behavior offered evidence on the relationship between the two variables [20]. In that study, it was found that problem-based learning successfully developed analytical thinking abilities which as well influenced attitudes towards science learning of grade-11 students [20]. A related study was conducted to examine the relationship among students' critical thinking (the analysis of online information in order to make sense), personal intelligence and effects on behaviours (sustenance of digital safety) [21]. A descriptive survey was adopted, with 510 basic nine students that were drawn from six junior secondary schools (JSS) in the randomly selected education district, the results showed that students' critical thinking was positively related to the sustenance of digital safety while students' personal digital intelligence was not [21].

2. METHOD

The descriptive survey research design was used for this study. This study was conducted in three randomly selected local government areas in Lagos state and the targeted population comprised all adult education students. A purposive random sampling technique was used to select 520 participants from six adult education centres in the randomly selected local government areas. Data was collected using a 28 item self-designed questionnaire that was titled - Students' Social Networking, Human-Artificial Intelligence Interface Skills and Human-Centered Behaviour Intentions Questionnaire (SSNHISHBIQ). Face and content validity was established by three experts from University of Lagos, out of which, two were from the department of educational management and planning and one was from the department of measurement and evaluation. The section A of the questionnaire sought to elicit information on respondent's biodata while the section B was structured on a four point scale of SA - Strongly Agree (4), A - Agree (3), D - Disagree (2), SD - Strongly Disagree (1). were used respectively for the measurement of positively structured questions and vice versa for negatively structured questions. A preliminary survey was conducted on 36 adult education students and a reliability index of 0.70 was obtained using the Cronchbach Alpha method. During the main study, a total of 520 questionnaires were distributed out of which 480 were correctly filled and returned and were used for data analysis. Data collected was analysed using both descriptive and inferential statistical

tools. The mean, standard deviation were used to answer the formulated research question. Hypothesis 1 and 2 were tested using the Pearson Product-Moment Correlation statistical tool while Regression Analysis statistical tool was used for Hypothesis 3, all at 0.05 level of significance.

3. RESULTS

Research Question 1: What is the level of students' social approval for basic AI?

Table 1: Level of Students' Social Approval for Basic AI

S/N.	Items	Mean	SD	Remark
1.	Social media's prediction of people that I may know is commendable.	2.26	1.18	Disagreed
2.	I do not appreciate the idea of getting recommendations on social media platforms that are not in line with my moral or ethical values.	2.64	0.95	Agreed
3.	I do not like the way messages or suggestions pop up on my page without taking into account my likes or dislikes.	2.54	0.87	Agreed
4.	The popped up messages or suggestions in social media platforms is not serving my interest.	2.74	0.87	Agreed
5.	The fact that I am served with contents or adverts by the prompting of social media platforms in alignment with the values of my community is laudable.	2.17	1.23	Disagreed
6.	My concern for anonymity or privacy has made me not to appreciate face recognition mechanisms in some social media platforms.	2.64	0.86	Agreed
7.	I do not appreciate google's map	2.15	1.03	Disagreed

	capability to suggest routes to follow.			
8.	I don't like ride sharing apps' (Uber, Bolt) capability to determine prices for customers.	2.58	0.97	Agreed
9.	I feel happy when my next line of action on the web is predicted accurately.	2.08	1.34	Disagreed
10.	I will like to use self-driving car	2.34	1.12	Disagreed
11	The idea of automated regulation of traffic by lights in our major roads is commendable.	2.54	0.99	Agreed
Grand Mean		2.42		Low

With the use of a 4-point Likert scale type, the expected average (mean) response per item should be 2.50 (either in favour or disfavour of what is being measured).

Data presented on Table 1 shows that all the mean scores ranged from 2.08 to 2.68. An average Mean of 2.53 was found. The respondents agreed with items 2, 3, 4, 6, 8, and 11, with their respective mean scores of 2.64, 2.54, 2.74, 2.64, 2.58, and 2.54 being higher than the set benchmark of 2.50. They however, disagreed with items 1, 5, 7, 9, and 10, with their respective mean score values being 2.26, 2.17, 2.08, and 2.34 that was lower than the set benchmark of 2.50. Overall, a grand mean score of 2.42 was obtained and this was below the set statistical benchmark of 2.50; therefore, it was concluded that students' level of approval for AI was low.

Test of Hypotheses

Hypothesis 1: There is no significant relationship between students' level of social networking and AI creativity skill

Table 2 Relationship between students' level of social networking and AI creativity skill

Variables	Mean	SD	N	df	r-cal.	r-crit.	P-value	Decision
Level of social net-working	19.34	3.16	480	478	0.34	0.098	0.002	HO ₁ Rejected
Students' AI creativity Skill	16.23	2.88						
P<0.05								

Table 2 shows the mean score, standard deviation, the r-calculated, and r-tabulated from the probability level 0.05. Table 6 reveals that the calculated 'r' value (r-cal. = 0.34) is

greater than the 'r' critical (crit 'r' = 0.098) given at 478 degrees of freedom and 0.05 level of significance. Also, the p-value of 0.002 is lesser than 0.05. As such, the null hypothesis which states that there is no significant relationship between students' level of social networking and AI creativity skill was rejected. It therefore means that there is a significant relationship between students' level of social networking and AI creativity skill.

Hypothesis 2: There is no significant relationship between students' level of social networking and AI analytical skill.

Table 3: Relationship between students' level of social networking and AI analytical skill

Variables	Mean	SD	N	df	r-cal.	r-crit.	P-value	Decision
Level of social networking	19.34	3.16	480	478	0.56	0.098	0.001	HO ₂ Rejected
Students AI analytical Skill	17.54	3.10						
P<0.05								

Table 3 shows the mean score, standard deviation, the r-calculated, and r-tabulated from the probability level 0.05. Table 3 reveals that the calculated 'r' value (r-cal. = 0.56) is greater than the 'r' critical (crit 'r' = 0.098) given at 478 degrees of freedom and 0.05 level of significance. Also, the p-value of 0.001 is lesser than 0.05. Hence, the null hypothesis which states that there is no significant relationship between students' level of social networking and AI analytical skill was rejected. This implies that there is a significant relationship between students' level of social networking and AI analytical skill.

Hypothesis 3: Human-AI interface skills (creativity and analytical) and human-centred behaviour intentions are not significantly related.

Table 4: Analysis of Variance of the Regression

Model	Sum of Squares	df	Mean Square	F	Sig.
Regression	4255.874	6	709.312	7.457	.000 ^b
Residual	596.473	471	2.538		
Total	4852.347	477			

a. Dependent Variable: Human-centred behaviour intentions

b. Predictors: (Constant), creativity skill, analytical skill
 From Table 4, the F-Value of 7.457 at 6(471) degrees of freedom was significant at 0.000 (p< 0.05). Thus, the hypothesis which states that there is no significant relationship between human-artificial intelligence interface skills (creative and analytical) human-centred behaviour intentions was rejected. This means that human-artificial intelligence interface skills creative and analytical are significantly related to human-centred behaviour intentions. This implies that the obtained adjusted R² value was not due to chance. Hence, creativity and analytical skills of human beings should be

taken into account when considering human-centred behaviours in Society 5.0.

4. DISCUSSION

The results of Research question 1 showed that students' level of social approval for basic AI was low. Although this present survey was not set to examine factors that could affect social approval for AI, it seems appropriate to mention that factors like gender, age, knowledge of AI, age, human gender, occupation, interest in science and technology and such other variables were implicated in earlier studies (Nomura Research Institute [12]; [14]; Lee et al.; Kochigami et al.; Reich & Eyssel [13]; they could account for the status of AI approval in non-formal education students as well. A noteworthy perspective stated that social media helps to build dialogue and constructive conversation with the public, particularly about sensitive topics, like genetic engineering and stem cell research [22]. A fair conclusion then could be that if AI, other technological advancements and applications are as well subjected to constructive conversations among social networking participants, there is a likelihood that social approval for it will improve.

The study yielded a significant positive relationship between the level of students' social networking and creativity skill; and as well, there was a significant positive relationship between students' level of social networking and analytical skill. The results aligned not only with the emphasised need for soft skills development but the fact that such skills is hardly dependent on formal learning as they are abilities that can be gained mostly from hands-on experience, relationship-building, and activities that will lead to maturity of thought processes which necessarily could be out of formal learning structures than in it [16]. Similarly, the case study that adopted interview strategy to elicit information from special employees (research scientists) on usage of social media in working environments for networking, information search, and idea generation revealed influence on creativity, knowledge creation, and innovation [22]. This implicitly relates that social networking activities among the research scientists may have enhanced the acquisition of soft skills like analytical and creativity.

On the need for human-AI interface skills, Holstein et al.; Organ et al.; Ritter et al. in [19] mentioned that in artificial intelligence educational systems, the in built goals may not always align with those of humans in real-world educational contexts. Miller in [23] added that one of the ways that AI can show it can match human-like creativity is for it to be able to assess their work. The process of adapting AIs to suit context-specific needs and the assessment of suitability of AI outputs appears to be more of what man should handle with the help of creativity and analytical skills. These skills appears to be what is called the 'missing middle' when working with artificial intelligent entities [24]. They are skills that do not necessarily require additional expertise in machine learning or robot programming, rather, they require thoughtful people who are better able to apply socio-emotional, creative and complex reasoning skills to the specific needs of the business [24]. The execution of such thoughtful inputs as was found in the present study, requires possession and utilisation of

analytical skill while creative adaptation in alignment with an individual's socio-emotional intelligence has to do input of creativity skill. Bearing this in mind, it can be argued that other AIs just like the specific case of AIEd system will need some form of human augmentations which could take many forms and including adaptations to suit context of usage. In AIEd systems, human creative inputs like organising prior work through the lens of human– AI hybrid adaptivity by the facilitators (teachers, peers), envisioning of new possibilities for human– AI hybrid approaches in education, and working in alignment with context specifics such as when it is necessary to override decisions made by AIEd technologies [19] are all creative inputs that should make AIEd usage more effective. They seem to be factors that can influence the facilitators' cooperative behaviours in the workspace. Although the perspective of human-AI partnership in in terms of advancement of the technology [25], the implied shepherding role of AI professionals that can lead AI into learning through mistake-making and in various iterations of a task over time while gathering information from a larger data set can be taken as creative inputs. This role however, requires a unique mindset (AI mindset) that is driven by problem solving, where the AI professionals will be expected to creatively imagine how the technology can be applied, and as well, with analytical acumen for results to be measured and success to be determined over time [25]. Kolbjørnsrud et al. [11] emphasised that soft skills in general are becoming increasingly important with the introduction of AI in organisational decision making; as such, organisations should consider the training of employees in capabilities for collaboration, creativity, and sound judgment.

From a related perspective, there are possibilities that information that are shared on social media platforms could have issues with credibility; and users' attempt of verification of both the information and the information provider are important [22]. These actions are best qualified as those requiring analytical skill. The results of this study therefore, allows conclusions to be made in alignment with the proposal that stated that first, it is important for human intelligence to be developed, especially in young children and with the support of artificial intelligence; second, communication, collaboration, critical thinking and creativity skills are skills that are necessary in today's world [26].

The results of this study showed that human-AI interface skills (creativity and analytical) and human-centred behaviour intentions are related. This means that human-centred behaviours (in terms of cooperation, mutual respect for other human participants, the upholding of ethical or moral values, abidance with AI policies that are formed by government or other regulatory bodies) can be initiated by acquisition and utilisation of creativity and analytical skills when using AI or working with artificial intelligent entities. Findings of the present study aligned with the survey results that showed a correlation among perceived analytical skills, employment relations and future workspace. The study [10] was however, focused on future workspace and not the entire society. The framework, where creativity, critical thinking,

and metacognition (learn to learn) were identified collectively as 'way of thinking' while communication and collaboration were labelled as 'way of working' in classroom context is noteworthy [27]. With the benefit of this framework, it was deduced that if creativity shares some characteristics with other competencies, and a teacher in classroom situation can put learners through its acquisition, then it can be possible for the child to develop the other "C" (communication and collaboration) as well [27]. Collaboration, recognised as a 21st century skill and as a method that is sometimes used in the classroom relates that individuals in a group are working in teams under conditions where members of the group will be responsible for the content of their work and are willing to work together (Felder & Brent; Slavin in [27]). Furthermore, these skills can be correlated, but they may not be easily sorted in terms of cause and effect [27]. This may be suggesting that there is a relationship between human-AI interface skills (analytical and creativity) and human-centred behaviour intentions; there might be a need to investigate if human-centred behaviours can affect human-AI interface skills.

5. CONCLUSION

AI and artificial Intelligent entities are fast becoming coexisting members of our our world, however, interactions between them requires first, the integration of 'intelligences' among all participants and second, in order to achieve an appreciable level of stability in the emerging Society 5.0, AI-induced responsibilities among all humans are equally important. Above all, since man is the ultimate beneficiary of AI, human-AI collaborations through verification and for trust to be established in AI require creativity and analytical skills.

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