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# Bright ICT and Unbounded Employment: Typology of crowdworkers and their Lived and Envisaged Career Trajectory in Nigeria

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**Abstract.** Employment and work are identified as a critical area that has been impacted by advancement of ICT and is currently passing through significant changes. Hence, the Bright ICT agenda calls for researchers to focus their effort on this area that is not only in need of better understanding but also holds potential better future for many around the globe. Influenced by the widespread connectivity to the Internet and the rise of digital platforms, new ways of working such as crowdworking is rising encouraging government and International agencies to consider it an alternative route for employment that could extend employment opportunities beyond national geography and regional barriers. This qualitative study responds to Bright ICT call by exploring the lived experience of crowdworkers and how they plan and develop their future. It aims to answer the question of how crowdworkers experience this type of employment and whether they can develop their skills and organize their future? The study identifies four categories of crowdworkers and shows their practices in developing and progressing their crowdworking experience. We conceptualise these practices as a career development path and identify four career progression stages. Implications for research and practice are discussed.

**Keywords:** Platform employment, crowdwork, career development, Bright ICT, Nigeria, crowdsourcing, digital platforms.

## 1 Introduction

Bright ICT represents an important initiative founded by the Association of Information Systems (AIS) that was announced in 2015 [1]. It aims to focus both research and practice on understanding the positive and negative sides of ICT and finding ways to create positive impact of ICT around the world. Work and employment are recognised as a critical area that has been impacted by the diffusion of the Internet and is currently passing through significant changes and needs better and comprehensive exploration and understanding. Hence, the Bright ICT agenda calls for researchers to focus their effort on this area which requires better understanding and also holds po-

tentials for a better future for many around the globe [2]. Influenced by the widespread connectivity to the Internet and the rise of digital platforms, new ways of working such as crowdworking is witnessing exponential growth. Crowdwork is a new way of working which allows employers to source labour from a large group of people via digital platforms [3]. It is a type of crowdsourcing where people conduct digital tasks using digital platforms as intermediaries in exchange for financial payment. In this regard, crowdsourcing presents a broader phenomenon that covers paid and no-paid digital work. Crowdsourcing offers numerous opportunities to the advantage of both employers and workers where employers reduce operating costs while workers get an opportunity to earn income [4-6]. Through platforms such as Freelancer.com, Upwork and Fiverr, individuals with the requisite skills and expertise can provide a wide range of information technology (IT) and business services to employers in remote locations [7]. Some of the services commonly provided on these platforms include image creation, graphic design, web design, app development, software testing, branding, product design, data entry, content creation, and market research [6].

Indeed, crowdworking has proliferated over the years, with individuals, small or medium enterprises being the top consumers and millennials accounting for the largest share of crowdworkers [8, 9]. Large firms have also become consumers of crowdsourcing services, a 2015 survey of the 100 Best Global Brands found that 85% of the brands had used crowdsourcing in the last decade [10]. Global research firm Gartner projected that crowdsourcing would account for 20% of all enterprise software development projects by the end of 2018 [6]. As technology advances, changing the nature and form of work by offering greater flexibility and autonomy to workers [11], crowdworking is expected to grow even more rapidly as a global phenomenon that crosses national and regional barriers, creating a global labour market. The study by Kappelman, McLean [12] revealed that challenges with IT skill shortage and retention is the second most worrisome issues with IT leaders. This brings to light the need to understand this growing group of workers and the lived experience of how they manage their lives and work in order to potentially develop a framework for hiring, motivating, retaining and developing crowdworkers.

Crowdwork is individualistic in nature without a formal structure, work teams, professional standards, and other institutional elements that characterise the traditional workplace [7, 13]. Here workers plan their lives, personal and skills development and growth independent of organisations. These aspects of work that are typically managed and monitored by traditional employers are becoming the responsibility of the individuals alone in the crowdworking model. Little we know about the possibility for crowdworkers to create and manage a career including their skills development, advancement and growth from crowdwork which is characterised by autonomy and flexibility [14]. Indeed, it's vital to understand the career trajectory of individuals as it determines the life of employment, the skills developed, the occupational achievement, and the living condition of workers [15] since work is the primary means through which individuals meet their needs for survival, relatedness and self-determination [16, 17].

So far there is little understanding of how crowdworkers experience this type of employment and whether they can develop their skills, make a progression plan and find a trajectory for life development and achievement that are encompassed in a career trajectory. Therefore, this research aims to seek to understand the lived and envisaged skills and career development in crowdwork through a qualitative study examining full-time Nigerian crowdworkers, Nigeria is one of the largest countries in Africa that suffer from a significantly high unemployment rate. Government and international development agencies promote Crowdworking as holding high hopes for Nigeria in reducing unemployment and contribute to the socio-economic development of the country [18] which seem to be at odd with the short term nature of crowdwork engagements. By focusing on Nigeria, we hope to offer an in-depth understanding that could be transferred to other developing countries.

This study specifically addresses two of the main issues in the Bright ICT initiative as identified by the [2] Delphi study. Firstly, it examines how the crowdworkers in Nigeria deal with the changes in the increased adoption of the internet and other ICTs and how they design and navigate their work lives in that context. Secondly, this study sheds light on the experience of the workers' adoption of crowdwork; specifically, it focuses on how Nigerian crowdworkers live and plan their lives in this form of work. These understandings provide a foundation for identifying critical issues in crowdwork adoption and its societal and personal implication on workers lives, thereby contributing to the knowledge about dealing with and solving the inherent problems with increased adoption of ICTs and platform employment [1, 2].

The paper consists of seven sections. Following the introduction is a brief literature review, section three presents the theoretical grounding of the study, and section four details the research methodology. The results of empirical findings in section five is followed by discussions and conclusions.

## **2 Literature Review**

### **2.1 Crowdsourcing and Crowdworkers**

Crowdsourcing is a work model in which employers (individuals or organisations) harness the collective skills, knowledge, and expertise of a large group of people to accomplish a given task through digital platforms and remunerate them for tasks completed [4, 5, 19]. This new way of working as part of the broader digital economy is temporary and casual in nature [20]. It is a form of work initially construed to be engaged in as a hobby, as a way to earn additional income, or because of its flexibility [21]. However, due to rising unemployment and redundancy, more people are venturing into crowdwork as a full-time work [22, 23]. The absence of organisational and institutional boundaries means crowdworkers are not tied to a single, permanent employer [7] which has important implications for how they manage their work. Crowdwork encompasses a wide variety of jobs. These include IT services (e.g., software development, software testing, or web design), routine administrative tasks

(e.g., data cleansing, data entry, or data processing), content development (e.g., image creation, video creation, or writing), and business services (e.g., product design, business analysis, or project management [4, 6]).

Originally, crowdworkers were misconceived as uneducated, low-skilled workers. Research finds that whereas some crowdworkers may be uneducated and low-skilled, the majority are educated and highly skilled [21]. According to Schweissguth [9], over 50% of crowdworkers held bachelors degree qualifications, and 20% had a masters degree. Most importantly, crowdworkers tend to be young knowledge workers, highly specialised and knowledgeable in their area of expertise [24, 25]. Kässi and Lehdonvirta [20] analysis of four major crowdwork platforms (i.e., Freelancer.com, Fiverr, Guru.com, and Peopleperhour) found that IT tasks such as software development account for over 50% all the crowdwork jobs posted and completed.

For so long, work has been primarily associated with organisations where employees follow particular skills development programmes and an organised career trajectory. A career trajectory, also known as a career path denotes the course and pattern of an individual's career progression during their active professional life [26, 27]. In the traditional work environment, one's career trajectory starts the moment one commences professional practice, the speed with which one advance across the career ladder is dependent on a combination of personal, social and organisational factors [28]. For instance, an individual who puts more effort at work is more likely to get a promotion. Additionally, career development is likely to be faster in an organisation that offers professional development opportunities such as continuous training [29].

Though both personal and organisational factors shape career progression in the traditional workplace, organisations play a particularly integral role. In the context of crowdwork, this element that shapes employees' career is absent [13]. Crowdwork lacks the traditional elements that shape or contribute to career advancement, such as direct employee supervision, incentives, and sanctions [7]. Though some of these management practices exist in some platforms, such as incentives and sanctions, their effectiveness is often hindered by factors such as the absence of direct supervision, invisibility of work behaviour, and the complexity of imposing sanctions [7]. For example, compared to traditional workers, crowdworkers can more easily exit without severe consequences. The unique nature of crowdsourcing has important implications for the career trajectory of crowdworkers.

Scholars and commentators have offered preliminary insight on crowdworkers skills and career development. According to [14], knowledge workers, especially software developers tend to have an individualistic orientation when it comes to career progression. Individual factors such as skills, abilities, intrinsic motivation, effort, and hard work [13] largely shape career in crowdwork. It helps crowdworkers garner up a reputation as trusted workers and, in turn, increases their chances of being awarded projects by employers. The ultimate determinant of a workers' proficiency is their reputation score, an aggregation of employers' feedbacks and platform reputation algorithms [30, 31]. On some platforms, workers with the highest score are given a label that identifies them as proven experts, which makes it easier for employers to

evaluate the capability of a worker before awarding a project. Such feedback systems significantly determine how fast one's crowdwork career advances [31]. The more positive reviews one garners and the higher the reputation score, the greater their chance of winning future bids. However, despite their usefulness, feedback systems on crowdwork platforms may not necessarily be an accurate reflection of a worker's level of expertise as they may often be exaggerated [30]. Hence, beside employers' feedback, crowdwork platforms offer workers the opportunity to undergo certain tests before being awarded work, examples are general tests (e.g., language tests) and subject-specific tests (e.g., software testing and content creation tests) [31]. Other reputation systems include machine-learning models, self-assessment, and automated feedback [30]. Irrespective of the method used, the underlying aim of a reputation system is to indicate workers' level of expertise or task-proficiency status. Based on the acknowledgement of the pivotal role of platform reputation system on crowdworkers careers, [7] proposed a four-stage trajectory for crowdworkers: 1) entry-level (un-trusted worker), 2) trusted worker; 3) hourly contractor, and 4) employee.

### 3 Theoretical Grounding

This study adopts Super's model of career development, also referred to as the life rainbow model. Developed in the 1950s and premised on human development principles, Super's model describes five stages of career development that occur as an individual: 1) growth; 2) exploration; 3) establishment; 4) maintenance; and 5) decline [32]. The tasks an individual undertakes in each stage tend to be distinct from other stages. Additionally, each stage correlates with significant events in a person's life, such as childhood, schooling, adulthood, and employment [33]. These events, according to [34], play a vital role in shaping who an individual becomes. At the core of Super's model is the argument that career development is influenced by three sets of factors: personal factors (psychological and biological), situational factors (socioeconomic and historical), and environmental factors (the labour market and employment practices) [32].

The first stage of career development according to Super's model is the growth stage. This stage starts from birth up to the age of 14 years and generally encompasses one's childhood [34]. At this stage, an individual's core occupation is school [33]. It is at this stage that the concept of self starts to develop. An individual develops interests and attitudes, socialises their needs, and starts to have a basic understanding of the world of work [32]. The exploration stage, which starts at the age of 15 years through to the age of 24 years. As a young adult, an individual attempts to understand who they are and makes a tentative career choice. Through schooling, hobbies, and work experiences, the individual gains a clearer picture of their interests and abilities as well as their place in the occupational world [33]. Based on one's tentative occupational preference, one acquires the requisite training and eventually secures a position in their preferred occupation [35].

The establishment stage is characterised by entry-level skill development and the achievement of professional stability (Super, 1953; Freeman, 1993). After entering

one's preferred occupation, one sharpens their professional skills and abilities and pursues opportunities for further career development. By performing one's roles and responsibilities in a satisfactory manner, one solidifies their position in their professional world [36]. The fourth stage of Super's career development model is the maintenance stage. This stage starts at the age of 45 years through to the age of 64 years [34]. At this stage, the individual continually enhances their skills and abilities in an attempt to improve their career position [33]. The individual also makes attempts to explore new challenges [32]. The fifth, decline stage is characterised by reduced productivity, and at this stage, an individual starts to prepare for retirement [33]. Owing to decreased output and diminished interest in the occupational world, the individual gradually exits the workforce.

## **4 Methods**

### **4.1 Research approach and Data collection**

This qualitative study adopts an inductive interpretive research approach involving multiple data sources in explorations of understandings, accessing intricate details and produce deep insights on crowdwork and crowdworkers [37, 38]. Data sources include face-to-face interviews, website reviews, observation of crowdworkers in their workspace, informal conversations, online blogs, social media and online discussion threads. In this study, 35 Nigerian crowdworkers (23 Male, 12 females) aged between 22 and 46 years participated in a mix of 38 unstructured and semi-structured interviews in three phases of data collection. The pilot phase of unstructured interviews with six participants carried out between December 2017, and January 2018 helped to gain preliminary insight on nature of crowdwork in Nigeria, challenges, crowdworkers' experience and work practices, which also aided the development of the research design. This was followed by two interview phases between June - August 2018 and October - November 2018 with 18 and 14 in-depth semi-structured interviews. Questions at this stage were more directed towards understanding crowdworkers' feeling and aspiration for their job, experiences, career plan, and motivation, social and work practices. The nature of the interviews allowed for divergence, spontaneity which gave the researchers an opportunity to gather quality and reliable data.

The first three (3) participant were recruited through personal contacts, and subsequently, snowballing sampling employed when participants recommended other participants. Other participants were recruited from closed online groups. Participants included in the study fit the inclusion criteria that they have been involved in paid full-time crowdwork for more than two years and specialised in IT/IT services crowdwork. This is to ensure that participants have sufficient experience and knowledge in order to be able to provide reliable and valuable insights on crowdwork in Nigeria [39]. The interview was triangulated with additional data was collected through informal face-to-face conversations, informal visits to workers workspace,

observation of online blogs, social media groups, online discussion threads and workers profiles on crowdwork platforms.

## 4.2 Data analysis

Interviews were transcribed verbatim and participants assigned pseudonym. An open and inductive approach was adopted in coding and theme development, which involves reflecting on explicit data content [40]. This approach focuses on identifying common threads that appear throughout interviews, and themes act as essential concepts that link different essential portions of the interviews together [39].

Notes of major crowdworkers' practices, experience, motivation and aspirations that were identified in the interviews were used to delve into more relevant concepts to form a better understanding and explanations of career trajectories of crowdworkers. Open coding makes it possible for concepts and themes to arise from the data in a manner that depicts the actual experiences and sentiments of the participants [40]. At this stage, each fragment and segment relevant data was captured and carefully examined for analytic interpretation. After different rounds of code generation, a comparison between different rounds of data was made, and the most useful data tested against a wide range of data. Each interview was coded to derive an emerging category that is based on sensitising concepts. Searches were made for emerging codes which were categorised into similar codes [41] and the data then used to develop the themes for in-depth and better understanding. After developing the themes, the researchers came together to review and merge the themes that overlap, confirm the themes and modify existing themes. The different categories were merged into similar themes to develop a higher order theoretical concept based on the practices, characteristics and sequential order of career progression of crowdworkers identified in the interview. This was backed up with crowdsourcing literature and theories on work career path. A theoretical representation of the themes that emerged from analysis of interviews and other data sources was hence presented in a model (see figure 4).

## 5 Research Findings

This section presents the findings on the career trajectories of crowdwork in Nigeria. It shows the different categories of crowdworkers involved in fulltime crowdwork employment and the different activities engaged in at the four stages different career levels of crowdwork career.

### 5.1 Categories of Crowdworkers

In our quest to understand the career-lifecycle and trajectories of crowdworkers, we identified four categories of people who are engaged in full-time crowdwork employment. This categorisation was based on two factors: previous employment status and previous familiarity with crowdsourcing. We established that previous familiarity with crowdwork or other crowdworkers affects career trajectory, the speed of accli-



matisation, and eventual success in crowdwork endeavours. We framed this form of involvement as “Warm Start” and “Cold Start”. Warm start means there is a less blunt entry into crowdworking due to previous relevant experience from which worker can draw inference upon and have a smoother start with limited pressure and time to ease into crowdwork. On the other hand, cold start involves individuals who experience a blunt entry with higher pressure, limited support, and a lack of prior experience and understanding of crowdwork before engaging in full-time crowdwork employment [42]. Based on previous employment status and previous familiarity with crowdsourcing, the four categories of crowdworkers we identified in this study are:

**Table 1.** Typology of crowdworkers

	Warm Start	Cold Start
Previously Employed	Switchers	Awakened
Previously Unemployed	Early Birds	Green Starters

Green starters are workers who were formerly unemployed and got into crowdworking mainly as a source of income and employment. Green starters are highly driven to gain income stability and attaining the work gives them a sense of gratitude. They start from scratch and learn how to navigate the platforms.

*“I got into crowdsourcing because of the issue of employment in the country, and one has to look for ways to make ends meet. I had to try crowdsourcing online, and do jobs for myself and make money, so no matter how difficult it is, it’s more like the [only] option I have”- Blessing*

Switchers are workers who were formerly in traditional full-time employment. To supplement their income, switchers work part-time but eventually switch to full-time crowdwork. As they work part-time, switchers gain skills and knowledge of crowdwork as well as build a reputation on the platform before switching, which makes it less challenging to shift to full-time crowdwork.

*“... was doing crowdsourcing for the extra cash, I get few jobs a month, but wasn’t really doing it fulltime until I discovered that I was making the same amount doing two software work a month and from my fulltime job, so I quit my Job and moved [into crowdwork] fulltime” - Daniel*

Early birds are workers who started crowdwork when they were at the university and never bothered to get into the formal labour market (i.e., they started as students). They become crowdworkers at the age of 17-23 years. Similar to switchers, early birds are familiar with crowdsourcing before engaging in it as full-time employment. Though early birds start crowdwork earlier, they may not necessarily have worked on crowdsourcing platforms: some of them initially work with established crowdworkers. This enables them to understand crowdwork and the opportunities it presents before getting into full-time crowdwork. Based on our study, this group of workers have been around crowdworkers and have done some form of crowdwork before getting into the labour market.

*“I learnt about crowdsourcing as a student during a 6 months internship in an IT company as part of my course. When I got there, they were actually a group of crowdworker working together as a company...they introduced me to it. When I helped with some work and got paid 20000Naira (\$40), I was excited and got hooked...didn't bother looking for work after graduation”- Jude*

Awakened crowdworkers are individuals who were engaged in a supposedly formal organisation working full-time but branched out to start their own work. They might be close to crowdworkers but may not have an idea of what goes on in crowdsourcing. This category of workers has to be awakened to their environment in order to engage in crowdwork.

*“.. I was working for an employer...I noticed he actually sourced this work online...I never thought it was that possible, easy, so when I saw how he does it he told me“ you can do it too, you can source this work yourself and then I won't have to be the middleman for you”, so he introduced me to the first site, and then I registered there.. that's how I got to where I am today.” - Aisha*

## 5.2 Career Trajectories of Crowdworkers

In our analysis of the career path followed by crowdworkers, we identified four stages, namely entry level (untrusted worker), mid-level (trusted professional), Veteran and post-career stage. The time spent moving through these stages differs among individuals. It was discovered that throughout the work lifecycle of crowdworkers, career stages are marked by the activities and practices they engage in rather than a specific positions or job title as in traditional employment. In other words, career stages are marked by their level of skills, capabilities, networks, practices and knowledge of the work. A career height is only reached or attained after successfully engaging in a series of systematic and progressive actions. We found that there are patterns to how an action affects the other which eventually affects the course of crowdworkers' careers. These actions include: building a reputation and social/resource networks; learning social and technology skills, and learning/skill upgrades and diversification.

**Untrusted Worker: Building a Reputation and Social/Resource Networks.** The algorithmic setup of crowdsourcing platforms necessitates that workers garner sufficient ratings and reputation on the platforms to be offered employment. While early bird and awakened workers have an easier time navigating and building offline support systems, switchers have an easier time building an online reputation because of their previous engagement as part-time crowdworkers. Workers starting up in crowdwork take their time to build their profiles and reputation by delivering quality products to employers. The platform reputation system is used by platform algorithms to rate crowdworkers skills, and this affects their employment potential and future crowdwork career survival. This is well articulated by Joseph below;

*“when I started I actually focused on the quality of job I delivered to my clients, so then I wasn’t after a lot of money... my goal then was to make sure I deliver a good job so that I can build the five-star profile. So then I focused on getting all my jobs done completely, and on time so that my clients would be happy with my job... now that I have been able to build a profile which is very good for me, I’ve been able to make a bit more money from it by getting jobs with higher pay and a lot of clients will come back and employ me too...so that’s the way I was able to build my profile”.*

As they build their reputation on crowdwork platforms, crowdworkers connect with networks of other workers by joining online discussion threads and social media groups. Workers also connect with crowdworkers offline, and these networks of crowdworkers play a vital role in the success of their careers both as a means of learning and as a support system when encountering challenges.

*“You need to know other people...I’m successful in this business because of my relationship with other workers, I can easily send a message to the (social media)group if I have problem with my payment system and within minutes, I’ll be able to know if everybody is also having the same problem and we can all find a way to address it...I have contact of enough crowdworkers in Lagos that we correspond regularly through text and calls to help each other and introduce to other people”- Monica*

There is constant learning throughout the career of crowdworkers, workers learn both social and technological skills. Technological skills relate to familiarising themselves with crowdsourcing platforms, understanding their interface, and learning how to bid for work. In terms of social skills, one major area of concern is the societal misunderstanding of any form of online work as fraud in Nigeria where people tend to relate online work with fraud. For switchers, learning how to transition from traditional full-time work and part-time crowdwork to full-time crowdwork is vital. The social reality of work changes because, with their previous employment, they have little course to defend their source of income in an environment that is suspicious of online work. Workers learn how to defend and project their work and how to navigate the societal perception of crowdwork. Folarin and Ola share their learning experiences;

*“It took me some time to master how to traverse the challenges of this work, it was a long learning experience for me.... Even to the basics of how I should talk about my work in public, how to deal with employers, and what sites [platforms] I should use for what....”-Folarin*

*“It’s a learning curve, there’s always something to learn...if not about the platforms, its from clients [employer], or other crowdworkers. Its important to know these things because you won’t succeed in this business without knowledge of a lot of things..and they take time”- Ola*

**Trusted Professional Crowdworker: Learning/ Skill Upgrades and Diversification.** After building networks, having a comfortable footing on the crowdwork dynamics, as well as understanding the social, technological, and economic dynamics of crowdwork, crowdworkers take the step of cementing their footings in the job. Just like any employment, in order to remain competitive and up to date, there is a need to

update existing skills and learn new ones. From our study, we discovered that after mastering the necessary aspect of their new employment, crowdworkers engage in skill update and upgrade. Workers upgrade their existing skills to remain relevant. The skills that people learn are driven by what is regularly advertised on the platforms. This is similar to traditional careers where people go for additional training and certification in order to increase their career prospects.

*“...as a crowdsourcer, when I see some job post online, it spurs me to go and learn those skills...I download books, watch YouTube tutorials... most of the things that I do currently as a crowdworker, I had to learn on my own by seeing that they are skills employers need” -Kingsley*

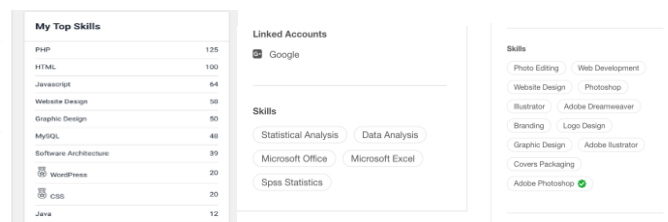
Workers learn new skills outside of their initial specialisation and fields. Some workers learn unrelated skills in order to diversify their skill set and thus expand the range of tasks they can apply for on crowdwork platforms.

*“As a software engineer, I saw many projects where employers need people to write proposals for software development projects, I learnt it and now almost 40% of what I do is related to writing proposal and instruction guides for clients” – Ify*

**Veteran Stage.** At this top-most active career level, crowdworkers engage in various types of activities with varying levels of expertise and concentration and practices.

Workers with *long-term* career view of crowdwork at this stage engage in practices aimed at increasing their opportunity by increasing their expertise and offering to potential employers on the platforms. Figure 1 below shows a career crowdworkers profiles across two platforms showing the range of skills he specialises on the platforms in order to ensure his career survival.

*“...decided to do this work for a long time, it’s been good to me...but I need to be competitive to make enough money to so that’s why I do more than one thing..[I] work on freelancer.com and Fiverr and specialise each profile on a specific area”- Daniel*



**Fig. 1.** A crowdworker’s three profiles on two platforms

Some crowdworkers at this stage revealed they work less on tasks by leveraging their high reputation on the platform to get as many jobs as possible and then serve as intermediation by outsourcing it to workers both on and off the platform. They are more engaged in administrative tasks which involve recruiting, managing, organising and

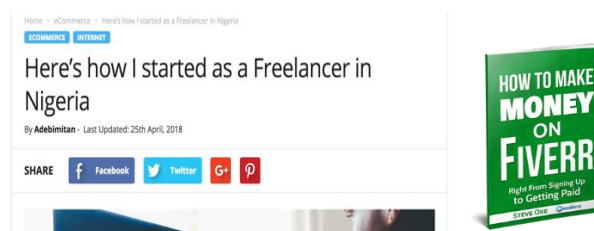
monitoring several tasks, workers, and employers at the same time (see Figure 2). Their network of workers and relationship with employers plays a significant role in the success of this practice.

*“What I do is get work on different sites and Clients [employers], negotiate payment and send the work to some of my guys [offline workers and fellow crowdworker], most times I get someone to take the Job... however if by any chance I cannot find anyone from my [offline]contact, then I’ll post it online”-Hamza*

ID	Date	Name	Amount	Payment Type	Bank	Account Number
1	02/12/2018	[REDACTED]	N 30,000.00	Bank Transfer	GTBank	[REDACTED]
2	02/12/2018	[REDACTED]	N 132,400.00	Bank Transfer	GTBank	[REDACTED]
3	05/12/2018	[REDACTED]	\$250.00	Paypal	[REDACTED]	[REDACTED]
4	05/12/2018	[REDACTED]	N 18,000.00	Bank Transfer	Access Bank	[REDACTED]
5	05/12/2018	[REDACTED]	N 80,000.00	Cash	[REDACTED]	[REDACTED]
6	06/12/2018	[REDACTED]	N 300,000.00	Bank Transfer	GTBank	[REDACTED]
7	07/12/2018	[REDACTED]	N 45,000.00	Bank Transfer	GTBank	[REDACTED]
8	08/12/2018	[REDACTED]	N 20,000.00	Bank Transfer	FirstBank	[REDACTED]
9	10/12/2018	[REDACTED]	N 120,000.00	Bank Transfer	Access Bank	[REDACTED]
10	10/12/2018	[REDACTED]	N 50,000.00	Cash	[REDACTED]	[REDACTED]
11	10/12/2018	[REDACTED]	N 35,000.00	Bank Transfer	FirstBank	[REDACTED]
12	11/12/2018	[REDACTED]	N 42,300.00	Bank Transfer	Diamond Bank	[REDACTED]
13	17/12/2018	[REDACTED]	N 70,000.00	Bank Transfer	FCMB	[REDACTED]
14	17/12/2018	[REDACTED]	N 10,000.00	Bank Transfer	Zenith Bank	[REDACTED]
15	18/12/2018	[REDACTED]	N 100,000.00	Bank Transfer	FirstBank	[REDACTED]
16	26/12/2018	[REDACTED]	N 20,000.00	Bank Transfer	GTBank	[REDACTED]
17	27/12/2018	[REDACTED]	N 55,000.00	Bank Transfer	GTBank	[REDACTED]
18	30/12/2018	[REDACTED]	N 30,000.00	Bank Transfer	FirstBank	[REDACTED]
<b>Total</b>			<b>N 1,067,950.00</b>			

**Fig. 2.** A crowdworkers spreadsheet to manage Payment for outsourced tasks

This career level is also one in which workers boast several years of experience in one or more fields of specialisation, they hence engage in activities by honing their skills and venturing into other knowledge areas to earn more income. Workers leverage their experience by writing books, creating blogs, and organising seminars and workshops on crowdwork. They use their experience and skills gained from crowdwork to guide others on how to navigate the complicated social, economic, and technological challenges of crowdwork. This may also take the form of mentoring new crowdworkers both online and offline. Figure 3 shows a sample blog post and a book written by a crowdworker.



**Fig. 3.** A blog post and book by crowdworkers

At this career stage also, some expand their horizon beyond employers on the platforms. Here crowdworkers simultaneously source for work and income both on and off the digital platforms and engaging in new business endeavours outside the platforms.

*“... I started submitting proposals for software contracts in companies and got two(2) projects last year now, the I experience and portfolio from the work online helped a lot” – Ahmed.*

**Post-Crowdwork Career Plan (Exit Stage).** This post active career stage of a crowdworker presents two post-crowdwork career paths identified in the study, i.e. Dream chasers and business entrepreneurs. Dream chasers are workers who plan to make enough money from crowdwork, then quit in order to follow their lifelong passion. Crowdworkers with this career goal are usually individuals who are presently earning sufficient and excess income from crowdwork.

*“I don’t think I’ll be doing this work forever; I have dreams... I currently do music sometimes, when I was a student, I use to produce tracks for my friends but because I didn’t have enough money to have my own production studio, I had to use my main skill, my dream is to make money from crowdsourcing and build my own studio”- Fred*

The other group, business entrepreneurs are workers who are already engaging in entrepreneurial business outside of the platform; these crowdworkers plan to expand and focus on the existing businesses they have created and quit crowdwork. By the time of exit, a crowdworker would have amassed sufficient resources to pursue other life goals.

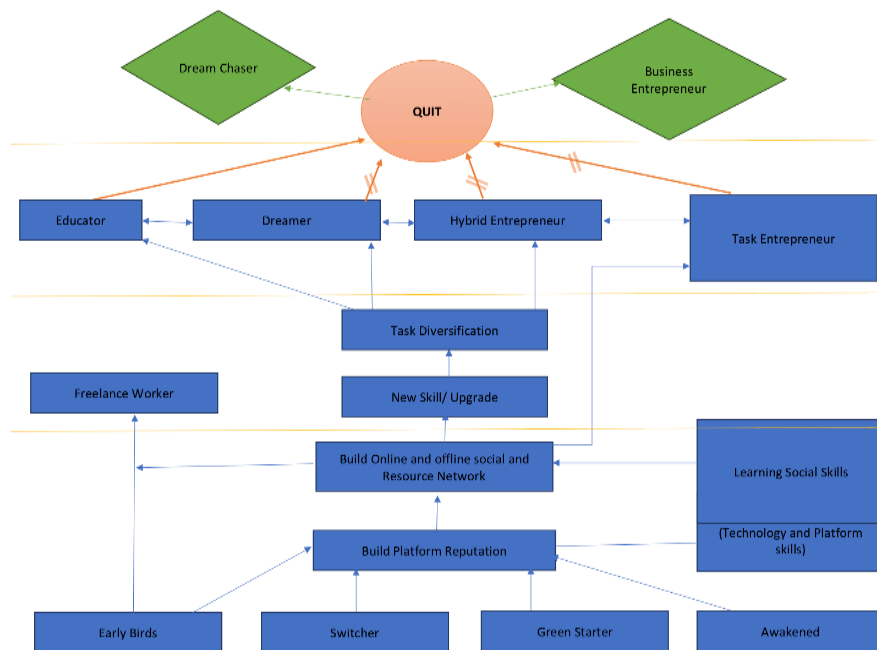
*“The money I’m making now, I’m using it to fund my electronic shops where I sell phones, computer, and everything electronic, so by the time I stop this job, I’ll focus on it as my full-time work. I’ll be a normal businessman”- Toju*

## 6 Discussion

This study contributes to the understanding of new types of work and employment that are brought about through the widespread use of Internet technology and the rise of digital platforms [44-50]. It addresses a critical area on the Bright ICT agenda. Hence, it aimed to understand the lived and envisaged career trajectories of crowdworkers. The study specifically intended to discover the different categories of crowdworkers and to map out the career path followed by crowdworkers. The study found that there are four categories of crowdworkers: green starters (previously unemployed individuals who venture into full time crowdwork to earn a living); switchers (individuals who abandon full time employment in other fields in favour of crowdwork); early birds (individuals who venture into crowdwork before engaging in any formal employment); and the awakened (individuals in full time employment but with no knowledge of crowdwork who require introduction to the world of crowdsourcing).

This study reveals that workers are not homogenous in terms of motivation for engaging in fulltime crowdwork employment or at what stage of their lives they start. While some start as students, others adopt crowdwork after years of traditional em-

employment. Crowdworkers who start as students are often disinterested in formal employment after their education. The attractive rewards and independence offered by crowdwork employment [9] make this group of workers satisfied with what they do, thereby eliminating or diminishing their aspirations for formal employment. Reasons for engaging in fulltime crowdwork go beyond unemployment, or the need for flexibility into a view of lucrative income possibilities for less work when compared with traditional employment. This study reveals that owing to dissatisfaction with formal employment and the attractiveness of income from crowdwork, many young adults are leaving traditional jobs in favour of platform employment [8].



**Fig. 4.** The career trajectory of crowdworkers

The career stages of platform workers as represented in figure 4 above do not have a clearly defined structure; instead, they are a composition of activities engaged in and the undefined roles and practice crowdworkers engage in during their career lifecycle. The entry level is marked by self-directed professional growth through building alliances with other platform workers and connecting with the communities of other crowdworkers while also building a reputation on the platform. Workers seek connection to advance their career prospects as this helps them understand their social situatedness and how to navigate the complexity of their work. Having the required skills and top reputation on the platform may attract employers [31] but does not guarantee success beyond a certain level. Having a social connection with other crowdworkers offline has been demonstrated to be a valuable asset for a long-term

successful career in platform employment, this negates the conventional wisdom of the individualistic nature of digital work [13].

The theoretical argument in this study is that in the initial stage of career development in internet-enabled work, workers' expertise, technical skills and platform reputation takes a prominent role. As workers progress, platform reputation loses its central potency while the ability to offer diverse expertise, maintain professional space, seek and exploit opportunities for growth within and outside the sphere of platform work ensures a viable career. The study shows the pivotal role that skill development and the diversification of skills have in ensuring income sustainability and career survival in crowdwork. This study also reveals that crowdwork and other Internet-enabled employment are not always and entirely individualistic, while by their nature they seclude workers from traditional organisational relationships, crowdworkers are able to shape their work by developing relationships with employers and forming social relationships with other crowdworkers for career survival.

This study found that crowdworkers learn new skills and attain new capabilities in order to take advantage of emerging opportunities for work in new areas and increase earnings. This findings negates the views of [42] and [43] that this form of work gives no opportunity for skill development. The findings show that crowdworkers experience becomes transferable and of economic value in the form of writing books and blogs, organising workshops, and seminars. Hence, building new and emerging economies from crowdwork, outside platforms including crowdworkers becoming employers themselves and building a work team, this empirically expands on [7] proposition on the career potential of crowdworkers being employer themselves.

Against the backdrop of fewer employment opportunities in the traditional work environment, crowdwork offers a wide range of employment opportunities for individuals with requisite skills and knowledge. For individuals already working as crowdworkers and those aspiring to join the field, this study offers valuable insights, providing a clear picture of the lived experiences of existing crowdworkers career paths and opportunities in crowdwork. Incumbent and potential crowdworkers can use this knowledge to inform their expectations of the field. It could create awareness and strengthen the acceptance of crowdwork in communities where there is scepticism about the employment viability of crowdwork adoption. It provides platforms operators with the knowledge needed to create a support infrastructure that helps individuals adopting crowdwork as fulltime employment manage their career. This study makes a contribution to the growing body of literature on crowdwork and career development which could be the basis for more rigorous research in this area.

In summation, crowdwork is heavily dependent on how it is framed and designed by workers in their societal context. This realisation optimistically presents an opportunity for researchers to present and study diverse frameworks for the shaping and framing of work, driven by workers' experience in relation to their society.



## 7 Conclusion and Limitations

This study has identified the various categories of crowdworkers as well as the career path followed by crowdworkers. Four categories of crowdworkers emerged from the study, ranging from early birds to switchers. Irrespective of the category, the trajectory of a crowdworker shares some similarities with that of a traditional worker. Though similar to traditional work, the career trajectory of crowdworkers is unique in its own way, mainly due to the absence of the organisational factor.

Whereas this study offers valuable insights on the career trajectories of crowdworkers in the context of Nigeria, like all qualitative research, the study provides an in-depth understanding of the lived experience of participants and is generalised to theory [37]. Hence, this research cannot claim generalisations to the entire country or other countries. More research is encouraged to examine and report on other contexts.

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