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The Adoption and Experience of Public Private Partnerships (PPP) During Covid 19 Environment: Lessons for The Future

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ABSTRACT: This study aims to investigate analyse the adoption of PPPs during COVID 19 and to examine the impact of COVID 19 on adoption of such PPPs... Drawing on systematic review, the authors investigated the COVID 19 has had a great effect on the adoption of PPP projects globally. The collected data has been analysed using the themes and content analysis. The findings have findings revealed that COVID 19 has had a great effect on the adoption of PPP projects globally. It was concluded that the adoption of PPPs can be a basis for developing better infrastructure in the era of COVID 19. It was recommended that Governments all over the world need to always use PPPs to address certain economic issues caused by COVID 19 pandemic. The results have also indicated the while PPPs have been used in normal times they have a more important role in saving lives during ahrd times like the Covid 19 times.. The contribution from findings will provide productive insights to help governements in identifying how PPPs can be deployed and utilised to save lives and how they can be affected.

KEY WORDS: public private partnerships, infrastructure, accountability

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INTRODUCTION

The study analysed the adoption of Public Private Partnership (PPP) Projects in the era of the global COVID 19 pandemic (Alliance For multilateralism, 2021). From the four corners of the globe, governments are straining to handle the short term, intermediate and long-term effects of the disasters caused by COVID-19 with the aid of PPP projects (Baxter & Carter, 2020). It's therefore important that various stakeholders in countries like Uganda need to manage such PPP Projects in the most effective manner. For that matter therefore, the COVID-19 pandemic is at present making many countries struggle to acquire critical healthcare infrastructure and logistics by partnering with the private sector entities through use of PPP projects (Casady & Baxter, 2021). A PPP project is an arrangement between the public sector entities such as central, local and statutory government bodies and a private sector entity such as profit-making agencies to develop infrastructure for services provision to the public (Nuwagaba, 2021).

Since 1990, most developed countries such as those of Northern America, Europe, Northern Asia, far East Pacific and Australia and developing countries such as those of South East Asia, the Asia-Pacific region, Latin America and sub-Saharan Africa have considered PPP projects as an important option for financing infrastructure (Nuwagaba, 2019). Currently, the PPP Projects for development of critical physical and social infrastructure is the most popular partnership during the response to COVID-19 in most countries (Hamed, Sadegh, Ibrahim & Mehrab, 2020). For example, many private hospitals shared their facilities and equipment with the government to increase the capacity of the health care sector. In fact COVID 19 has triggered a number of long term public and private sector collaborations by use of PPPs to deal with the impact of COVID 19 (APMG, 2020). As such, government leaders need to use PPP project best practices developed from handling of the past pandemics to adequately deal with the current COVID 19 pandemic situation.

Such leaders need to come up with policy guidelines that promote close corporation between public sector actors and private sector players to adopt better PPP projects so as to effectively deal with emergent disasters caused by COVID-19 (Park & Chung, 2021). The COVID-19 therefore provides a chance to many countries in both developed and developing economies to rethink and re-assess the conventional PPP projects' systems, structures and processes and put into consideration how such PPP Projects can be remoulded and remodelled to be fit for purpose of dealing with the impact of such COVID 19 pandemic (Hunt, & Noble, 2020). Such PPP Projects are a crucial aspect in dealing with pandemics such as COVID-19 that is so far the most dangerous calamity since the last 20 years in terms of magnitude of exposure of human life to it (Hamed, Sadegh, Ibrahim & Mehrab, 2020).

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In order to respond adequately with such human disaster, most Governments need an extra capacity, which may be provided by the private sector with better technical capacity. The COVID-19 pandemic has overwhelmed many national political, economic, social, technological, ecological, legal and ethical systems, structures and processes globally (Baxter & Casady, 2020). In attempts to meet their emergency needs and mitigate escalating challenges, governments are increasingly reaching out to the private sector to form sustainable PPP Projects. Burdened with the real possibility of widespread project failures and constrained budgets, governments are searching for ways to prioritize projects in need of relief and bolster post-pandemic recovery plans. Unfortunately, many of these ad hoc efforts have been reactive and uncoordinated to date (Baxter & Casady, 2020). In fact budgets for certain sectors such as Education are continuously being slashed down by a number of countries so as to create a pool of extra resources required to tackle economic crisis caused by the COVID 19 pandemic and many governments are embarking on the use of PPP projects to meeting such financial and technical capacity gap (World Bank, 2021). Nether the less, it may also depend on the conditions of the PPP projects and how they were defined in line with handling risks associated with such pandemic (World Bank, 2021). The main objectives of the study are to analyse the adoption of PPP projects during the global COVID 19 pandemic and to examine the impact of such COVID 19 on adoption of PPP projects.

THEORETICAL LITERATURE

The global effort to engage in a tough and brutal war fare against a number diseases such as the current COVID 19 has given rise to a number of interventions in the health sector involving collaborations and corporations with various key stakeholders to develop and improve certain projects and programs to control and eliminate the crisis caused by the pandemic (Sigamani, Komali, Ramesh, Sulochana, Lekha & Rice, 2021). Therefore, in the advent of such COVID pandemic, there is need for adopting PPP projects, since public sector agencies are fully armed to deliver a set of required logistical support, critical services and technical support (International Finance Corporation (IFC), 2021). A PPP Project is an approach used to promote a collaboration between public sector and private sector to provide services to the citizens in a more effective, efficient and economic manner (Tshombe & Molokwane, 2016). A project is an arrangement created temporarily to produce a unique product or service based on certain standard operating procedures that have been agreed upon by the key stakeholders involved (Buehring, 2019).

Currently, the need for use of PPP projects in a number of sectors such as health sector has been a result of increased COVID 19 cases that overwhelmed the existing public and private systems, infrastructure and facilities (Nduhura, Nuwagaba, Thekiso Molokwane, Settumba and Lukamba, 2020). Never the less, although the PPP Projects are essential in such a precarious situation, it is also wise to continuously critically assess the viability of using such PPPs in terms of drawing

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boundaries between the public players and private prayers, the politics of such partnerships, level of accountability, equity, transparency and risk sharing among the partners (Ahmad, 2020). Much as its common for most countries especially in Sub Saharan Africa to be constrained by a wide physical and social infrastructure gap, the COVID 19 disaster has stripped naked the nations' decaying health infrastructure and so the governments can resort to the use PPP projects as financing option for revamping their decomposing healthy sector (Arimoro, 2021).

In fact, the COVID 19 has completely circumvented the day-to-day life styles and livelihoods of many individuals, households, communities, societies and nations all over the globe with a number of transformations in the way certain things are being done such as turning away from face-to-face school-based learning to virtual home-based learning through use of PPP projects by public schools and online service providers (Butcher, 2020). The COVID-19 pandemic has indeed provided opportunities for governments all over the world to rethink, refocus, redesign and re-prioritize the way they acquire, assemble, allocate and utilise resources in the provision of essential services to the citizens by partnering with the private sector through use of PPP Projects (Ahmad, 2020). For instance, the Israeli public sector agencies have been supported by private sector agencies involved in hi-tech to design and develop systems of detecting, diagnosing, tracking COVID 19 patients, preventing against the virus contamination and protecting the health sector staff using PPPs (Ahmad, 2020). Therefore, development of digital systems and processes for improved service delivery during this era of COVID 19 will be the order of day which will pave way for adoption more PPP projects especially in the global health sector to flatten the COVID 19 related recession curve (APMG, 2020).

To a great extent most countries all over the world have not been widely linked to such recession but the advent of COVID 19 is likely to impact PPP project in such recession (Greene, Huber & McClellan, 2021). To advance more PPP projects for resilient solutions to dealing with COVID-19 pandemic, a number of collaborations between government and private sector pharmaceutical companies have been able to produce and distribute millions of vaccines globally (Greene, Huber & McClellan, 2021). The COVID-19 pandemic is placing unprecedented stress on PPP projects, creating the real possibility of widespread project failures (Carter & Baxter, 2020). The extraordinary COVID-19 outbreak faced by governments around the world sheds light on a number of important strategies for improving public procurement in times of disaster. In 2020, when the 4% of the 50 million people that had been previously infected with SARS were found out to be prone vulnerable and susceptible to Covid-19, the US department of Health and Human Services organized a PPP Project code named Operation Warp Speed (OWS) to initiate, manufacture and provide 300 million doses efficient COVID-19 vaccines in 2021 (NASEM, 2020).

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In the current COVID-19 crisis, countries therefore must devise better strategies for sustaining PPP projects without repeating mistakes of abandoning already exiting PPP Projects because of the impact caused by the pandemic (Carter & Baxter, 2020). While recessions were note planned to affect most of the parts of Sub-Saharan Africa (SSA), shockwaves caused by COVID19 have made the already existing tough situation much more complex and will continue to shrink countries into deeper perilous times (WB, 2020). To this effect, this calls for both contractual improvements and non-contractual means of equitable risk sharing during unprecedented crises like COVID-19 (WB, 2020). Although a number of approaches for managing various risks associated with PPP projects during such crises have been devised, the economic impact of the current COVID-19 crisis indicates that these approaches are not very effective (Oehmen, Locatelli, Weid & Willumsen, 2020). It should be noted that pandemics like COVID-19 generally follow the "law of regression to the tail" and tend to fall into the category of "ignorance" for many public and private organisations that partner to implement PPP projects, even though their risks are technically well understood, described, and quantified (Oehmen et al. 2020).

With more PPP project disruptions expected, the longer this Covid 19 pandemic continues, PPP project counterparties may need to begin exploring non-contractual means of equitable risk sharing to cope with the unprecedented impacts of COVID-19 (Carter & Baxter, 2020). There is therefore need to develop effective political, policy, legal, regulatory and institutional frameworks for adopting and implementing the right needed PPP projects to efficiently deal with urgent crises such as COVID-19 (June & Eunbin, 2020). The aftermath of COVID-19 fallout is therefore more likely to create greater opportunities for the adoption of new models of PPP projects (Veronica, Niccolò & Eric, 2020).

METHODOLOGICAL APPROACH

This study adopted an exploratory research paradigm in line with the phenomena under study. To gain insights on what has obtained so far on the COVID 19 pandemic, a theoretical review was undertaken in collecting data. Data was analysed and used to assess the adoption of PPP projects in the era of COVID 19 pandemic. Theoretical approach is justified in circumstances where empirical study was not possible. It is further suggested that when using secondary data, the dependability of sources is important. The quality of data can be tested through assessment of expertise, credibility, reputation and overall trustworthiness of the source of data (Wondershare, 2021).

To ensure dependability, the study collected data from peer reviewed journal articles, conference papers, bibliographies, published market reports, national government publications, and local government publications. Since the COVID 19 phenomena is relatively new about 2 years, the

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study focused on reviewing data from other additional reputable sources such as World Bank, United nations, World Health Organisation, published articles from peer reviewed journals and national government publications. From first contact documents, additional documents were identified and analysed. The objective of the review was to find answers to the research questions that guided this study and ultimately make recommendations. The study questions were; What PPP projects have been adopted during the COVID 19? How has COVID 19 affected the adoption of such PPP projects?

RESULTS AND DISCUSSION

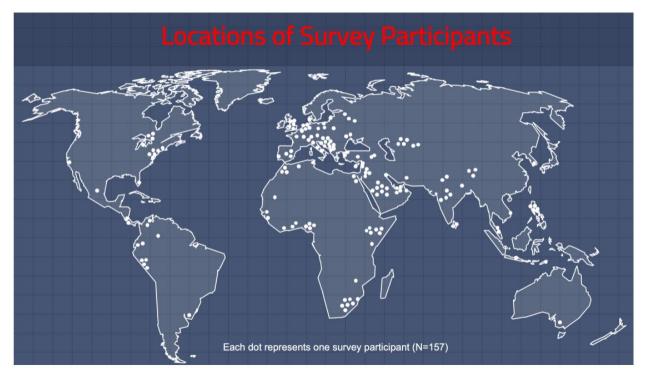
According to Baxter (2020), a survey conducted from 69 countries as indicated on figure 1 below, on the impact of the COVID-19 Pandemic on PPPs indicated that the biggest Covid-19 challenge that PPP projects are facing were the issues of reduced interest to invest in some types of PPP projects due to the weak financial markets all over the world and failure to realise the bankability of the PPP Projects as a result of reduced economic activities. The sectors with PPP Projects that were more susceptible to the impact COVID-19 included digital, waste management, housing, agriculture, education, prisons, petrochemical, sanitation, energy, transportation, water, energy and healthcare. In this post-COVID-19 period, the economic and social sectors with PPP Projects that are more optimistic were digital technology, renewable power, housing, tourism, defence, healthcare, transportation, leisure, prisons, education, waste management, agriculture, water and sanitation.

The aid that was required from development partners to invest in PPP Projects during recovery period of most economies globally were providing enough financial support, promoting strategic networks among key project stakeholder, ensuring effective communication among project team members, training and capacity building to realise expedited tracking and providing more support in the area of technical expertise. Baxter (2020) goes ahead to say that the execution of the emergency action plan for COVID-19 that range from policies of lockdown to social distancing have majorly impacted on the need for PPP projects to develop infrastructure for provision of services to the citizens. The social and economic sectors with PPP projects that were more susceptible to COVID-19 are ports, roads, ferries, airports and energy and as a result have highly declined in their demand for financial revenue generation. Moreover, COVID 19 has highly interrupted a number supply chains for various goods and services. The new regulations for safety and health measures such as the requirements for social distancing and restrictions for travel have all slowed down the processes of PPP project cycle at all stages in most parts of the world.

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Figure 1: Location of survey participants for impact of COVID 19 on PPP Projects



Source: Baxter (2020)

Based on figure 1 above, a simple survey on impact of COVID 19 on PPP projects was undertaken from 69 countries of the world and the distribution of survey respondents was as follows: Africa 20.4%; Asia 19.1%; Australia 06%; Europe 27.4%; Middle East 13.4%; North America 8.9%; and South America 7.6 %.

According to Park and Chung (2021), due to existence of COVID 19, the essence of the PPP projects in putting in place better health systems is currently being highly realised in both developed and developing countries. For instance, after discovery of COVID 19 Patient within 10 days in China, the government adopted PPP projects on 30th January 2020 to pave way for conducting COVID 19 tests on large-scale. As a result, a company called Kogenebiotech was initially given the opportunity of executing a PPP project for controlling COVID 19 on 4th February 2020 when a number of people infected with corona virus was gradually increasing, after the 2 weeks of the initial outbreak of COVID-19.

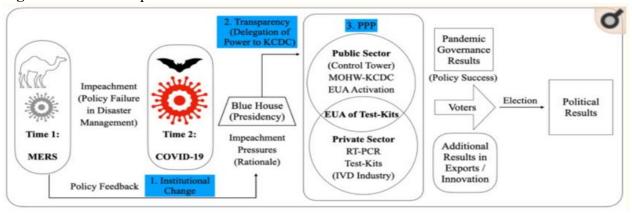
In South Korea, the government charged Korean Centre for Disease Control (KCDC) with the responsibility of controlling the spread of the corona virus through implementing specific policies such as use of PPP Projects to put in place COVID 19 testing facilities so as to conduct testing for

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corona virus on a large-scale and extensive basis in order for the citizens to easily access such public testing services. The South Korean Government went ahead to give KCDC more autonomy under the Ministry of Health and Welfare (MOHW) to take full charge of the control of the COVID 19 in the entire country. Once such PPP project intervention was put in place, the South Korea government was able to flatten the COVID 19 curve. In addition, a number of calls for developing COVID 19 test kits, was made by KCDC and many COVID 19 test-kit developers responded to such call. After the COVID-19 curve was flattened, the excess COVID 19 test-kit was produced and exported to other countries using Korean air ways whose planes were transformed into cargo planes after passenger airplanes had been suspended due to increasing COVID-19 which made South Korea to get recognition globally as indicated on figure 2 below.

Figure 2: General impact of COVID 19 on PPPs



Source: Park & Chung (2021)

Based on figure 2 above, PPP project implementation in Early Response to COVID-19 led to South Korea exporting COVID test-kits to 103 countries to a tune of \$0.26 billion from January to April 2020.

According to World Bank Group (2019), the current COVID-19 crisis has constrained the development of physical and social infrastructure using PPP projects under the different sectors all over the world, leading to negative impact on the government agencies, private service deliverers, development partners, donors and the citizens involved in the provision and use of the facilities for such infrastructure. Although all actors involved in the provision and use of the facilities for such infrastructure are focusing on ensuring that the PPP projects being used to deal with COVID 19 pandemic do not fail, as of now the strategies being used are temporary since they are just hinging on coming up with short term remedies against the effects of the COVID 19 pandemic.

In many instances, these strategies ranged from use of PPP projects to provide relief to the

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affected people and communities in addition to contractual agreements between public sector agencies, private sector investors, donors and development partners to devise means for putting in place feasible interventions on a temporary basis. However, six months into the COVID 19 crisis, it was visible that this situation was not going to come to an end with in the shortest possible time. That's why therefore the public sector agencies, private sector investors and development partners involved in the provision and use of the infrastructure facilities and assets developed with the aid of different models of PPP project are required to look beyond the short-term interventions to long term solutions when addressing the effects of COVID 19 pandemic in the different countries of the world as indicated in figure 2 below.

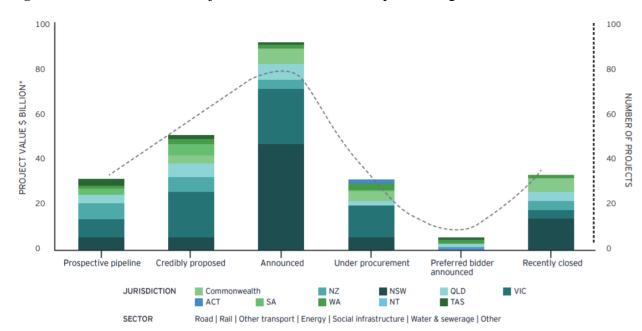


Figure 3: Some of the PPP Project models that can be adopted during the COVID 19 Period

Source: World Bank Group (WBG) (2019)

As indicated on figure 3 above, a number of PPPs as both short term and long-term interventions to dealing with COVID 19 pandemic are in pipeline, being proposed, being announced, under procurement process, being awarded to the best bidders and eventually closed under the different sectors of the road, rail, air and water transport, energy, water, sewerage and sanitation.

According to the New Community Program (2020), the response by various public actors and private players to the crisis caused by COVID-19 have globally impacted the economies of different countries. This is because the economic activities that are not very essential have been set aside by a number of countries, in addition to disrupting many supply chains, commerce,

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travel and tourism. As a result, there has been declining economic productivity and increased unemployment levels especially in 2021 all of which have culminated into declined GDP in various parts of the world. Now that different countries world has opened again their economies after lockdown, using PPP projects to finance physical and social infrastructure will boost economic growth for such countries. That's why countries in both developed and developing economies need to use PPP projects in different sectors such as transport, education, energy, security and health to deal with the vagaries of COVID-19 crisis. Therefore, Governments in such developed and developing economies can invest in PPP projects to come up with effective policy responses to deal with the impact of COVID 19 pandemic as indicated on table 1 below.

Table 1: PPP project policy responses to COVID 19

Stage	Government	+ Investors	→ PPP
Identification, Appraisal & Structuring	s Slowdown in activity. s Travel constraints. s Budget constraints. m Work constraints relaxed. m Desire to boost infrastructure. m Budget constraints. m Policy priorities may change.	(investors not directly involved in these stages) (investors not directly involved in these stages)	 Delays. Difficult to access sites. Desire to cut preparation cost. Pressure to speed up the process, take short cuts. Pressure to minimize preparation/advisor costs. Review past decisions and priorities.
Tender	s Slowdown in activity.	s Travel constraints. s Review resources, strategy. s Financing uncertainty.	 Delays, extensions to tenders. Delays to financial close. Fewer bidders. Shift towards locally-based bidders, lenders. Failed tenders.
	 M Work constraints relaxed. Desire to boost infrastructure. Budget constraints. Policy priorities may change. 	 m Flight to quality. m Problems in other markets, bankruptcies. m Financing constraints relaxed. 	 General decline in number of bidders. In riskier countries, shift towards local investors, lenders. Possible shift in investor interest towards middle/high-income emerging markets. Greater attention paid to risk allocation, government may have to take more risk, provide guarantees.
Construction (highest risk stage – Parties committed but no revenue)	s Slowdown in activity. s Travel constraints.	s Supply chain disruption. s Lockdown/quarantine measures. s General economic downturn.	 Delays in decisions, permits. Equipment, materials delays. Risk of Contractor/sub-contractor bankruptcy. Force majeure claims, disputes, PPP Contract renegotiation.
	m Work constraints relaxed.m Policy priorities may change.	m Problems in other markets, bankruptcies.	 Risk of Contractor/sub-contractor bankruptcy.
	m Fewer resources for Contract Management.	 m Shift towards less risky markets. m Financing constraints relaxed. 	 Risk of investor bankruptcy. Force majeure claims, disputes, PPP Contract renegotiation. Shareholders wish to exit.

Key: (s) = short-term; (m) = medium-long-term

Source: New Community Program (NCP) Research Paper (2020).

Based on the table 1 above, globally, many Governments are now using PPP projects to come up with policy priorities to deal with direct and indirect effects of the COVID 19 crisis which include providing relief to the vulnerable communities and people during lockdowns and putting in place better health sector systems, facilities and infrastructure in place.

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According to Asian Development Bank (2021), although the projects being funded by public sector in different countries are normally protected from economic meltdown, continuous rise in debt financing by their respect governments is likely to negatively impact the adoption of PPP projects to develop more infrastructure in response to COVID-19 crisis.

This is because COVID 19 pandemic has constrained the generation of government revenue through taxes that would be used to finance PPP projects since most economic activities that form a bigger tax base came to a standstill especially during lock downs of 2020 and 2021 in most countries all over the world. This has been common especially in instances where the PPP project contractual agreements require prior government commitments to financing such PPP projects before private sector investors can come on board to work with such governments in executing such PPP projects to develop the required infrastructure to deal with the effects of COVID 19 crisis. That is why a number of most of the planned large scale global PPP projects especially in the construction sector have been negatively impacted by the advent of COVID-19 pandemic as indicated on table 2 below.

Table 2: PPP Projects in response to effects COVID-19 pandemic

Key Findings Recommendations PPP projects and project participants may be affected Governments and other PPP project participants should by changes in supply chain, human resources, and work remain mindful of their respective short-, medium-, and arrangements. long-term outlook toward PPP projects and programs. Projects in the construction phase have been more In the short to medium term, responsiveness and agility vulnerable to and more affected by supply-side impact will be key to adapting existing projects to ongoing and have experienced longer lead times. changes. In the medium to long term, enhanced and Infrastructure demand profiles have changed broader policy and administrative frameworks should significantly but have affected assets differently and sustainably support coordination and risk allocation are likely to persist. Mass transit, air, and rail patronage across governments and PPP project participants. has decreased significantly because of COVID-19 Governments may want to consider smaller-scale restrictions and measures, while there has been projects that might be advanced more quickly if the goal an increase in demand for telecom and healthcare is to accelerate economic recovery. infrastructure. Governments must identify and assess fiscal risks to Despite challenges and consequences of COVID-19, manage consequences of COVID-19, such as uncertainty governments generally continue looking to with respect to government receipts. Governments infrastructure projects, including PPPs, as a key driver of should consider developing a fiscal risk matrix to economic stimulus and recovery. coordinate risk management between finance ministries, Unlike the 2008 global financial crisis, the COVID-19 the executive branch of central governments, and each crisis has not had the same impact on availability of relevant government department. credit thus far. For example, ADB has increased lending in response to COVID-19.

Source: Asian Development Bank (2021).

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From table 2 above, most countries are now under enomours pressure to prioritise the allocation of the scarce financial and material resources they have at hand to improve on their already existing PPP projects, other than coming up with flesh PPP projects so as to provide what is required in developing physical and social infrastructure for dealing with the effects of post-COVID-19 pandemic.

According to Baxter and Carter (2020), the uptake of PPP projects to develop the badly needed commercial and health infrastructure to respond to the vagaries of COVID 19 crisis can easily be analysed using PPP project triage framework during the COVID-19 period.

Based on such a frame work, there is a high possibility for a number of PPP projects to fail in realising their intended objectives and as a result most countries are likely to find it very difficult to keep incorporating such PPP projects in their national development plans and yet they need to look for all possible ways of ensuring that such PPP projects are effectively used as a strategy to recover from the impact of COVID 19 crisis.

This means such countries need to undertake a quick national wide elucidation of the existing PPP projects in the health sector to ascertain whether they can be of great help as governments look for all ways to recover from the vagaries of COVID 19 crisis. In such analysis, there is a possibility for most public sector entities such as Ministries, Departments, Agencies, public financial institutions and their corresponding PPP units having scarce financial resources to fund their organisational operational, tactical, strategic, project and program activities as what is happening in the health sector when it comes to funding PPP projects for supply, installation, operation and maintenance of ICU equipment in most hospitals. Therefore, the countries that are faced with such challenges should come up with feasible PPP project criteria and action plans to deal with the existing problems associated with COVID 19 pandemic based on the PPP Triage frame work as indicated on the table 3 below.

Table 3. PPP Triage frame work

Triage Code	Criteria	Action or Priority
Blue	Project without a need for economic stimulus	Periodically (re)assess project key performance indicators (KPIs)
Green	Project experiencing minor financial/economic losses	Closely monitor project KPIs for early signs of project distress/default
Yellow	Project needs temporary/stop-gap support or restructuring	Explore contractual renegotiation procedures and other conciliation mechanisms
Red	Project will not survive without significant economic relief	Evaluate existing government guarantees and other opportunities for economic resuscitation
Black	Project cannot survive, even with government intervention	Prepare for contract termination and/or buyout procedures

Source: Baxter and Carter (2020)

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Based on the table 3 above, governments are adopting PPP projects at different priority levels based on the various colour schemes of Blue which indicates COVID-19 patients that don't require immediate health attention, Green which indicates COVID-19 patients with simple health problems, Yellow which indicates COVID-19 patients with more severe health problems, Red which indicates COVID-19 patients that pass away because of failure to treat them there and then and Black which indicates COVID-19 patients that may not get any survival chances.

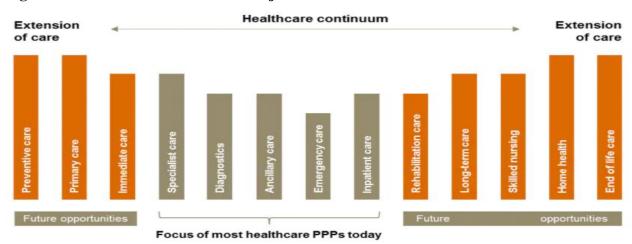
According to Nduhura, Nuwagaba, Thekiso Molokwane, Settumba and Lukamba (2020) and then PWC (2021), of recent, different countries are using PPPs as sustainable interventions to deal with health problems emanating from COVID 19 that are affecting their citizens. Some countries are also using PPP projects to manufacture, distribute and deliver COVID 19 vaccines and other supplies required by the different hospitals to effectively manage COVID 19. This is because the use of PPP projects in responding to effects of COVID 19 leads to VfM in terms of cost effectiveness, improved efficiency, timely delivery of better-quality products and services all of which culminate into better health-care management systems.

Currently, the need for use of PPP projects in health sector has been a result of increased COVID 19 cases that overwhelmed the existing public and private health care systems, infrastructure and facilities. That is why there is now high demand for a number of PPP projects to improve and support already existing and the new health care sector systems, infrastructure and facilities in order to effectively handle the effects of COVID 19. Moreover, COVID-19 has clearly proven that monopolising health care systems by public sector agencies is now an obsolete policy and so most governments are now encouraging private sector actors to also participate in the provision of health services to their citizens through use of different PPP project arrangements in improving healthcare systems, infrastructure and facilities for improved service delivery to their citizens as indicated on figure 4 below.

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Figure 4: Focus of health care PPP Projects



Source: Price water coopers (2021)

Based on figure 4 above, most PPP Projects used in the health sector focus on different aspects of preventive care, primary care, immediate care, specialised care, diagnostics, ancillary care, emergency care, in-patient care, rehabilitation care, long term care, skilled nursing, home based care and end of life care.

According to Lalita, Sandeep, Gallina and Ivailo (2020), the adoption of PPP projects in the health sector to prevent, test and treat COVID 19 in addition to providing relief to the vulnerable people and communities requires countries to come up with policies that can be used to flatten the curve for COVID 19. Governments can use PPP Projects to come up with priority policies, ranging from COVID 19 prevention, testing and treatment and recruiting more health officers. PPPs can also be used to provide social protection policies such as relief in form of financial support to vulnerable people, households and communities. Other priority policies that countries can put in place using PPP Projects include monetary policy to give cash bailouts to small and medium sized enterprises (SMEs) and private financial institutions such as micro finance and commercial banks that have been badly affected by COVID 19 in addition to relaxing on the requirements for acquiring loans from financial institutions such as collateral.

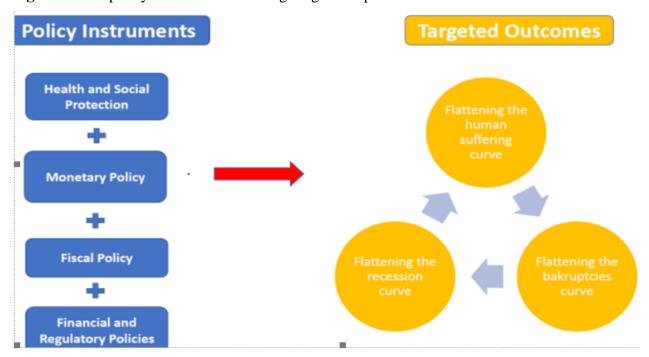
There is also need to use PPP projects to come up with industrial policies in form of postponement of business and mortgage loans acquired by various business, construction and manufacturing firms to an appropriate time by banks that offered such loans. Trade policies can also be put in place using PPP projects to simplify business registration procedures for business firms, relaxing on restrictions for importation of goods. Finally, countries need to adopt PPP Projects to come up with fiscal policies such as reducing taxes for some local businesses,

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providing tax exemption for business firms that produce essential items such as health supplies for COVID 19 and giving tax holidays to crippling businesses as a result of the impact of COVID 19 as indicated on figure 5 below

Figure 5: PPP policy frame work for mitigating the impact of COVID 19



Source: Lalita, Sandeep, Gallina and Ivailo (2020)

Based on the figure 5 above, if countries use PPP Projects to come up with effective priority policy instruments such as health, social protection, monetary, fiscal, financial and regulatory policies, they will be able to realise their targeted outcomes such as flattening the recession, human suffering and bankruptcy curves caused by COVID 19 pandemic.

CONCLUSION AND RECOMMENDATIONS

The use of PPP projects as responses to the effects of COVID 19 pandemic by the public and private sector agencies have impacted a number of countries economically and socially. Because of imposition of lockdowns several times and too many restrictions in addition to change of government priorities in the allocation available scarce resources to deal with the emergent COVID 19 issues, there has been considerable slow execution of PPP projects in many countries. Although some countries have been able to flatten the COVID 19 curve, a number of sectors such as health, transport, water, sanitation, security, tourism, agriculture, construction, security and

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energy with already existing PPP projects have been largely impacted negatively and still have a lot of uncertainty on the way forward for revamping PPP projects with in such sectors.

That is why countries that are focussing on adoption of new PPP projects to foster recovery in their economies are now under enormous pressures on how best to go about it. Indeed, there is no way governments can avoid use of PPP projects in revamping their key economic and social sectors because it is through the adoption of such PPP projects that the badly needed infrastructure to promote economic recovery can be effectively developed. Therefore, there is need for governments to come up with different suitable PPP projects to quickly respond to a number of emergencies caused by COVID 19 pandemic. Never the less, individual responses to effects of COVID 19 pandemic through use of PPP projects will depend on particular existing economic and social situations and key government priorities with in the different parts of the world.

To effectively use PPP projects in response to vagaries COVID 19 pandemic, there is need for governments to use best practices. Such PPP project best practices may include better risk allocation and sharing, cost minimisation, efficient, effective and economic allocation and use of the available resources when implementing such PPP projects. In addition, the different countries using PPP projects to manage COVID 19 crisis should ensure timely delivery of high-quality services so as to realise best Value for Money (VFM) in the provision of essential basic services to their citizens during this period of COVID 19 pandemic.

References

- Ahmad, N. (2020). Public-Private Partnerships during COVID-19: time to ask some questions: Beyond the COVID Curve, Law and Ethics, Security, October 30, 2020.
- Alliance For multilateralism (2021). The need for strong global cooperation and solidarity to fight COVID-19.
- Arimoro, A. (2021). The Corona Virus (COVID-19) Pandemic and the Challenge of Healthcare Infrastructure in Nigeria: what Role for Public-Private Partnerships? Theoretical and Applied Law, 2020. No. 3(5). Pp. 18-33, Nottingham Trent University, 28 Mar 2021.
- Asian Development Bank. (2021). Covid-19 and Public-Private Partnerships in Asia and the Pacific Guidance Note February 2021 Covid-19 And Public-Private Partnerships in Asia and the Pacific Guidance Note.
- Association of Project Managers Group International (APMG) (2020). PPPs and Covid-19: Your Questions Answered. Answered to received several questions from delegates during the 'PPPs and Covid-19 Webinar.
- Baxter, D. (2020).157 Public-Private Partnership (PPP) Practitioners from 69 Countries Share their Insights on the Status of PPPs in the Pandemic Epoch, June 15, 2020.

Print ISSN: 2054-6335(Print),

Online ISSN: 2054-6343(Online)

- Baxter, D. & Casady, C. B. (2020). Proactive and Strategic Healthcare Public-Private Partnerships (PPPs) in the Coronavirus (Covid-19) Epoch; 23 June, 2020.
- Baxter D. & Carter B. C. (2020). A Coronavirus (COVID-19) Triage Framework for (Sub) Natonal Public–Private Partnership (PPP) Programs, June 2020.
- Buehring, S. (2019). What is a project? Definition of a project according to prince 2
- Butcher, J. (2020). Public-Private Virtual-School Partnerships and Federal Flexibility for Schools during COVID-19; Special Edition Policy Brief, Goldwater Institute, March 25, 2020.
- Carter, B. C. & Baxter, D (2020). Pandemics, public-private partnerships (PPPs), and force majeure; COVID-19 expectations and implications.
- Casady, C. B. & Baxter, D. (2021). Procuring Healthcare Public-Private Partnerships (PPPs) Through Unsolicited Proposals during the COVID-19 Pandemic, Journal of Public Procurement June, 2021.
- Greene, K., Huber, K. & McClellan, K. (2021). Building Public-Private Partnerships to Support Efficient and Equitable COVID-19 Vaccine Distribution, Access, and Uptake, April 12, 202.
- Hamed, S., Sadegh, S., Ibrahim & Mehrab, S. S. (2020). Public-Private-People Partnerships (4P) for Improving the Response to COVID-19 in Iran; Published online by Cambridge University Press, 24 June 2020.
- Hunt, C. H. & Noble, G. (2020). Reconsidering PPPs in Developing Countries: How governments can use PPP renegotiations to adapt infrastructure, November 23, 2020.
- June, P. & Eunbin, C. (2020). Learning from past pandemic governance: Early response and Public-Private Partnerships in testing of COVID-19 in South Korea.
- Kabahinda, E. & Mwesigwa, R (2022). Trust Mediates the Relationship Between Stakeholder Behavior and Stakeholder Management of Public Private Partnership Projects in Uganda.
- Lalita, M. Sandeep, M., Gallina, A.V. & Ivailo, I. (2020). A Policy Framework for Mitigating the Impact of the COVID-19 Crisis. https://elibrary.worldbank.org/doi/abs/10.1596/33776
- National Academies of Sciences, Engineering, and Medicine. (2020). Public–Private Partnership Responses to COVID-19 and Future Pandemics: Proceedings of a Workshop—in Brief. Washington, DC: The National Academies Press. https://doi.org/10.17226/25999.
- Nduhura, A., Nuwagaba, I., Molokwane, T., Settumba, J. P. Lukamba, M.T. (2020). Public Private Partnerships: Systematic Review of Available Models for Improving Healthcare December 2020.
- New Community Program (2020). Impact of Covid-19 on Public-Private Partnerships, November 2020
- Nuwagaba, I. (2019). An assessment of Public Private Partnerships in the roads sector. A case of Uganda National Roads Authority: North West University, Vaal Triangle Campus, South Africa.

Print ISSN: 2054-6335(Print),

Online ISSN: 2054-6343(Online)

- Nuwagaba, I. (2021). Principal-Agency Relationship in the Road Transport Sector: Implication of Public Private Partnership Project adoption for Uganda National Roads Authority" Ugandan journal of management and public policy studies.
- Oehmen, J., Locatelli, G., Weid, M & Willumsen, P. (2020). Risk, uncertainty, ignorance and myopia: Their managerial implications for B2B firms. Industrial Marketing Management, 88, 330–338. [Crossref], [Web of Science ®], [Google Scholar].
- Park, J. & Chung, E. (2021). Learning from past pandemic governance: Early response and Public-Private Partnerships in testing of COVID-19 in South Korea, April, 2021.
- Price Water Coopers . (2021). PPPs in Healthcare: Models, lessons and trends for the future.
- Sigamani, P., Komali, K., Ramesh, R. B. P., Sulochana, S., Lekha, B & Rice, L. (2021). Multistakeholder Participation in Disaster Management-The Case of the COVID-19 Pandemic.
- Tshombe, L. M., & Molokwane, T. (2016). An analysis of public private partnership in emerging economies. *Risk Govern Control Fin Mar Inst*, 6(4), Virtus Enterprises, Ukraine.
- Veronica, V., Niccolò, C., Eric J. B. (2020). Medical Supply Acquisition in Italy and the United States in the Era of COVID-19: The Case for Strategic Procurement and Public–Private Partnerships, July 15, 2020.
- Wondershare, F. (2021). What is the meaning of theoretical approach? https://www.quora.com/What-is-the-meaning-of-theoretical-approach
- World Bank (2021). Covid-19 and PPP Contracts; Public-Private Partnership Legal Resource Center https://ppp.worldbank.org/public-private-partnership/covid-19-and-ppp-contracts, June 29, 2021.
- World Bank (2020). COVID-19 (Coronavirus) Drives Sub-Saharan Africa Towards First Recession in 25 Years. Press release retrieved from https://www.worldbank.org/news.
- World Bank Group (2019). PPP Legal Frameworks Post-COVID-19 Practice Note: Infrastructure Finance, PPPs and Guarantees Group of the World Bank. www.worldbank.org/ppp