

**PUBLIC-PRIVATE PARTNERSHIPS  
FOR HEALTH CARE INFRASTRUCTURE  
AND SERVICES:  
CONSIDERATIONS FOR POLICY  
MAKERS IN UKRAINE**

Health policy paper series





**World Health  
Organization**

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European Region

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# ABSTRACT

Independent of the current conflict, the health sector in Ukraine faces several critical shortcomings. In particular, the country has an oversupply of hospitals and an undersupply of primary care and diagnostic facilities. Addressing these limitations will require substantial amounts of capital investment, but constraints on public finances in the post-war context will reduce the Government's ability to fund the needed reconfiguration. Multiple international financial institutions have stated their intention to support reconstruction in the aftermath of the war. The use of public-private partnerships (PPPs) may support the achievement of these outcomes and their use in Ukraine is likely to remain an important issue for Government policy-makers and their partners to consider in a variety of post-war scenarios. This report draws on evidence from countries of the WHO European Region and elsewhere to evaluate if and how PPPs can be used to strengthen the health system in Ukraine.

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# CONTENTS

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|                        |    |
|------------------------|----|
| Acknowledgements ..... | iv |
| Abbreviations .....    | v  |

---

|                              |          |
|------------------------------|----------|
| <b>1. Introduction .....</b> | <b>1</b> |
|------------------------------|----------|

---

|  |          |
|--|----------|
| <b>2. Policy objectives and legal frameworks for health sector PPPs in Ukraine .....</b> | <b>5</b> |
|--|----------|

---

|   |          |
|---|----------|
| <b>3. The three models of PPP under active consideration in Ukraine .....</b> | <b>8</b> |
| 3.1 Model 1. Specialized clinical services/diagnostic services .....          | 10       |
| 3.2 Model 2. Health facility PPP .....  | 12       |
| 3.3 Model 3. Integrated PPPs .....  | 16       |

---

|   |           |
|---|-----------|
| <b>4. Opportunities and challenges for Ukraine's health sector .....</b>            | <b>19</b> |
| 4.1 Strategic and capital planning .....  | 20        |
| 4.2 Financing the long-term costs of PPP contracts .....                            | 21        |
| 4.3 Strengthening capacity to undertake effective PPP projects and programmes ..... | 23        |
| 4.4 Focusing on function, not form .....  | 24        |

---

|                         |           |
|-------------------------|-----------|
| <b>5. Summary .....</b> | <b>25</b> |
|-------------------------|-----------|

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|                            |           |
|----------------------------|-----------|
| <b>6. References .....</b> | <b>28</b> |
|----------------------------|-----------|

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# LIST OF ABBREVIATIONS

|      |  |
|------|--|
| CEB  | Council of Europe Development Bank               |
| EBRD | European Bank for Reconstruction and Development |
| EIB  | European Investment Bank                         |
| IFC  | International Finance Corporation                |
| IMF  | International Monetary Fund                      |
| MHIF | Mandatory Health Insurance Fund                  |
| NHSU | National Health Service of Ukraine               |
| PPPs | public–private partnerships                      |
| WBG  | World Bank Group                                 |

МІНІСТЕРСТВО ОХОРОНИ ЗДОРОВ'Я УКРАЇНИ



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# 1 ■ INTRODUCTION

Independent of the current conflict, the health sector in Ukraine faces several critical shortcomings. In particular, the country has an oversupply of hospitals, most of them unfit for purpose and costly to operate, alongside an undersupply of primary care and diagnostic facilities. Addressing these limitations will require substantial amounts of capital investment, but constraints on public finances will reduce the Government's ability to fund the needed reconfiguration.

Before the conflict, recognition of these conditions gave rise to strong political support for public-private partnerships (PPPs). This was captured by the Decree of the President of Ukraine No. 261/2021 (1), which instructed cabinet ministers to enable effective application of PPPs in the health sector and implement a number of complementary reforms, including the creation of a so-called capable hospitals designation, to provide a focus for investments and establishment of financial and operational autonomy for hospital organizations and other providers.

At the time of writing (May 2022), the social, economic and political situation of post-war Ukraine is unknowable. It is clear, however, that the health-care infrastructure of the country has been severely damaged (as of 11 May 2022, WHO had verified 230 military attacks on health facilities). It is also evident that reconstruction efforts will occur in the context of severe macroeconomic constraint. In the face of these challenges, multiple international financial institutions – including the European Bank for Reconstruction and Development (EBRD), European Investment Bank (EIB), Council of Europe Development Bank (CEB), International Monetary Fund (IMF) and the World Bank Group (WBG) – have stated their intention to support reconstruction in the aftermath of the war, including through the use of PPPs (2). From a health sector perspective, it is important that such efforts are:

- well coordinated
- targeted to address both long-standing shortcomings and conflict-related destruction
- implemented effectively.



The use of PPPs may support the achievement of these outcomes if they are used to improve project selection, enable organizational efficiencies and enhance the value for money of infrastructure- and service-delivery in Ukraine. Their use in the country is therefore likely to remain an important issue for Government policy-makers and their development partners to consider in a variety of conflict-related scenarios.

In the health sector, PPPs involve a long-term contract between a private sector entity and a government entity for the provision of health-care facilities, equipment and/or services. Currently there is limited experience of PPPs in Ukraine and consequently limited capacity to design and implement policies that facilitate and optimize their use. In contrast, there is much experience of PPPs in other countries in the WHO European Region and in Australia, Canada and the United States of America. A substantial evidence base on the use of health sector PPPs in high-income countries and some middle-income countries exists (3). This report draws on this evidence and provides an analysis of the legal, public policy and health system context in Ukraine to evaluate if and how PPPs can be used to strengthen the health system.

The report is structured as follows:

- Chapter 2 briefly summarizes the current (pre-war) legal and policy framework for the application of PPPs in Ukraine's health sector;
- Chapter 3 identifies the three PPP models being considered in the country and draws on the international evidence to assess their probable costs, risks and benefits;
- Chapter 4 examines the health system's readiness for the adoption of PPPs and defines the actions Ukraine needs to take in the post-war context to ensure PPPs can address the priorities of the health system; and
- Chapter 5 summarizes the main recommendations.

This report argues that in the health sector, capital investment projects – whether implemented through a PPP or some other procurement approach – should be focused on the service delivery priorities identified by national/subnational health authorities and aligned with those of key existing policy frameworks, such as the National Health Reform Strategy for Ukraine 2015–2020 (4) and the draft Health Strategy 2030 (5). Before initiating a procurement, health authorities should therefore address the following questions:

- What services do we want to provide in the public sector/by using public funds?
- In what tiers of the health system (primary, secondary or tertiary care) do we want to provide these services?
- What facilities are required to do this and/or are capable of doing this at the required level of quality, and what facilities are not required to do this and/or are not capable of doing so?
- What investments are required to enable the desired reconfiguration of the health-care estate?

The final question above relates to the investment decision – that is, to invest or not. This should come before any decision is made regarding the method of procurement (that is, to use a PPP or an alternative modality for implementation). Having made a decision to use a PPP, it is then essential that the implementation process is supported by competent public organizations that have awareness and understanding of (and are therefore able to mitigate) the costs and the risks, as well as the potential benefits.

PPPs generate long-term costs to the public sector that are subject to variation. Managing these requires a comprehensive and transparent budgeting process, incorporating a clear analysis of the adequacy of the available budget for the National Health Service of Ukraine (NHSU) and other relevant budgets to meet the ongoing costs under a variety of scenarios. The process should also include independent scrutiny with the involvement of public auditors to ensure value for money and transparency and to prevent corruption during and after the procurement process. Specialist human resources are required to plan, procure, negotiate and monitor PPP contracts; a sensible approach is to start small, developing the necessary expertise over time and deploying small-scale contracts that in case of failure will not undermine the financial sustainability of local public health systems.

**ВІДДІЛЕННЯ ЕКСТРЕНОЇ МЕДИЧНОЇ ДОПОМОГИ**



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## 2 ■ POLICY OBJECTIVES AND LEGAL FRAMEWORKS FOR HEALTH SECTOR PPPS IN UKRAINE

PPPs are tools that governments can use to advance their strategic objectives. The decision to use PPPs does not constitute a strategy in itself, and it is important to be clear about objectives by identifying what shortcomings or identified needs it can help to address. In the European Region and elsewhere, PPPs have been used for a range of purposes that are reflected in Ministry of Health guidance in Ukraine. They include (6):

- the need to harness private sector resources – financial, physical and/or managerial – to enhance the health services available to the general population, including through the use of contractually specified public sector and/or regulated user-fee revenue streams;
- the desire to overcome constraints on public sector budgets for capital expenditure and/or recurrent expenditure;
- the intention to engage private sector management skills to improve the technical quality and productive efficiency of health-care facilities, equipment and services (including clinical and non-clinical services); and
- the opportunity to enhance the quality of project selection and the transparency and value for money of government procurement programmes.

Over the last decade in Ukraine, public policy and legal frameworks have been adjusted to accommodate the use of PPPs. In 2018, for example, the Ministry of Health published new methodological guidelines for national-, oblast- and city-level health-care authorities on the implementation of PPPs (6).

A number of legal instruments on PPPs and concessions have been introduced, which set out:

- the basic definitions of PPP in Ukrainian law, the economic sectors in which they can be used and rules concerning the provision of state aid and state guarantees (Law of Ukraine “On public–private partnership” dated 01.07.2010, No. 2404-VI);
- economic features of the concession model, one key stipulation being that the majority of a private partner’s income should come from direct payments by services users, not public funds (Law of Ukraine “On concessions” dated 03.10.2019, No. 155-IX);
- features of procurement processes for the allocation of PPP contracts to private partners (resolution of the Cabinet of Ministers of Ukraine “On some issues of organization of public–private partnerships” dated 11.04.2011, No. 384) and for the financial and economic appraisal of proposed transactions (resolution of the Cabinet of Ministers of Ukraine “On approval of the methodology for identifying risks of public–private partnerships, their assessment and determination of the form of their management” dated 16.02.2011, No. 232); and
- the basis and methodology for determining payments to private sector concessionaires (resolution of the Cabinet of Ministers of Ukraine “On approval of the methodology for calculating concession payments” dated 12.08.2020, No. 706).

Further legislation is in process that will enable Government authorities to make long-term budgetary commitments to PPP contracts by providing an exemption from the normal maximum three-year commitments (Draft law No. 5090 of 17.02.2021 “On amendments to the Budget Code of Ukraine regarding the regulation of budgetary relations during the implementation of agreements concluded within the public–private partnership framework, including concession contracts”). As discussed in the chapters below, the passing of this legislation (which pre-war was being prepared for its second reading in parliament) will be an important moment for the development of a health sector PPP programme in Ukraine. This legislation is likely to be a precondition for forms of PPP that rely on long-term contractual commitments from the Government, including all of those examined below.



# 3 ■ THE THREE MODELS OF PPP UNDER ACTIVE CONSIDERATION IN UKRAINE

PPPs share several common features, the key ones being the use of private financing for capital expenditure, the bundling together of outputs in the scope of a single transaction with a single private partner, and the sharing of costs, risks and benefits between the entities involved. There are many different models of PPP, however, which vary in terms of the scale of capital expenditure required, the range of assets and services involved, and the costs, risks and benefits borne by each entity. Because each model has different economic characteristics, they are used to address somewhat different objectives. Table 1 provides an overview of the three PPP models that, according to analysis and interviews, have been under active consideration in Ukraine.

**Table 1. Types of health sector PPPs under consideration in Ukraine**

| Model   | Economic features  | Opportunities and challenges  |
|---|--|---|
| <b>Model 1</b><br>Specialized clinical services/diagnostic services PPP | The public sector identifies specialist services to be provided by a private operator. The operator finances up-front capital costs. Payment to the operator is made by government on the basis of an annual per capita or per treatment model (or a combination), and in some cases users' co-payments. | <b>Opportunities</b><br>Can enhance the availability of medical facilities, equipment and services for the population(s) targeted while improving the quality of clinical services and/or the efficiency of their provision.<br><br><b>Challenges</b><br>High transaction costs and/or per capita/per session prices are probable.<br><br>Projects can influence and perhaps distort resource allocation unless selected specifically to address identified gaps in the availability of prioritized services (such as those defined by the essential health service package). |

| Model  | Economic features   | Opportunities and challenges  |
|--|---|---|
| <b>Model 2</b><br><b>Health facility PPP</b> | <p>The private sector partner manages the design, build, financing and operation of health facilities (such as hospitals, ambulatory care facilities, polyclinics, primary care centres, and maternal and paediatric clinics). Management of clinical services remains in the public sector. Contracts last for 30+ years and may include outsourcing of so-called soft facilities management (such as catering, cleaning and laundry services). Payment to the private operator is made by government, usually on the basis of a performance-adjusted availability charge. Co-payments by users for some limited costs may also be in place.</p> | <p><b>Opportunities</b></p> <p>Can enable access to private finance for capital investments, relaxing public budget constraints and enabling additional investment in the health estate and equipment</p> <p>Can enhance the efficiency of capital procurement with an emphasis on establishing <b>certainty of public sector costs</b> over the life cycle of the assets.</p> <p><b>Challenges</b></p> <p>Substantial government capacity and a competitive market environment are required to secure and sustain value for money over the duration of the contract</p> <p>Future costs are difficult to forecast and budget for, and there may be perverse incentives to misrepresent future costs; as a result, there are risks to long-term affordability, such that the financial sustainability of local health systems can be compromised (7).</p>   |
| <b>Model 3</b><br><b>Integrated PPP</b>      | <p>The private operator manages the design, build, financing and operation of health facilities and a range of clinical services on a long-term basis, typically ranging from 10–20 years. Payment to the operator is made by government, usually on the basis of a prospective global budget that includes the operator’s cost of capital and may be supplemented by user co-payments.</p>   | <p><b>Opportunities</b></p> <p>Can mobilize private financing for both capital expenditure <b>and</b> recurrent expenditure (if user fees are involved).</p> <p>Can enhance the efficiency of government procurement with an emphasis on life-cycle costs.</p> <p>Can enhance the range and quality of medical equipment and clinical services to persons in the targeted populations.</p> <p><b>Challenges</b></p> <p>Health authorities must be able to specify clinical service requirements and monitor these assiduously.</p> <p>The risks to affordability and the financial sustainability of local health systems can be severe and difficult to mitigate.</p> <p>Equity of access and financial protection are compromised if user co-payments are a major component of the private operator’s revenue stream (as will be the case if the concession legal structure is adopted in Ukraine).</p> |

Sources: author’s analysis, based on International Finance Corporation (8).



## 3.1 | Model 1. Specialized clinical services/diagnostic services

In this model, a private operator commits to delivering specialized clinical/diagnostic services under contract with a public sector authority for:

- a specified range of clinical and/or diagnostic facilities and/or equipment; and
- a related range of services, with a specified number of patients and/or treatments to be undertaken over a multi-year period (often 5–10 years).

Payment to the operator is made by government, usually on the basis of a prospective global budget, supplemented in some cases by user co-payments (though private funding of this form is not essential to the model).

In principle, PPPs of this model have the potential to:

- enhance availability of high-quality specialist medical infrastructure, equipment and services for the general population of the country;
- improve public authorities' procurement of equipment, with an emphasis on reliability of equipment and predictability of operating costs to government over the life cycle of the assets;
- contribute to the development of new models of care and organizational efficiencies, including the need for hospitalizations;
- allow the public sector to benefit from the skills and competencies of specialist international businesses, of which there are many in key service domains such as dialysis, radiotherapy and day surgery; and
- enable public authorities to attain experience and know-how in procuring, designing and monitoring contracts for health-care infrastructure and services.

This model has been used in several countries in the European Region, most commonly for haemodialysis. There is good evidence from, for example, Kyrgyzstan, the Republic of Moldova and Romania that the model represents a feasible method for expanding free or subsidized access to specialist medical equipment and services. Evidence on value for money is mixed, however, and is limited by the absence of a clear counterfactual or any systematic benchmarking of costs or benefits. Cases indicate that the transaction costs of the model are high relative to other forms of contracting (such as direct contracting by an insurance fund or other strategic purchaser) and may be affordable only if there is external support (from development partners, for instance). Transaction costs for private sector bidders also tend to be high, limiting the number of submitted bids, reducing competition in procurement and increasing bid prices. These factors may explain the relatively high service fees observed on these transactions compared to those of other contracting modalities (see Box 1).

In addition to value for money (productive efficiency), it is important to ensure that PPPs contribute to, or at least do not undermine, the capacity of the health system to address the most critical population health needs (allocative efficiency). The selection of services to be provided should reflect their degree of priority for the system as a whole (as specified, for example, in the programme of medical guarantees). Services contracted through this model are likely to represent only one input into a defined pathway of care and will not constitute a whole case episode. Clear clinical guidelines and referral criteria are therefore needed to define the types of patients eligible to receive the services, alongside credible and auditable data on referral patterns.

Projects of this type under consideration in Ukraine include the establishment of a new radiology centre at the National Cancer Institute, Kyiv.

### **Box 1. Haemodialysis PPPs in Kyrgyzstan**

Legislation to regulate the use of PPPs in the health sector was enacted in 2013. From that year, the Ministry of Health worked with development partners to prepare feasibility studies for a project to deliver hemodialysis capacity in the country. Initially, the level of interest from international market players was considerable, with expressions of interest from companies headquartered in 12 countries and bids based on prices per session ranging from US\$ 25 to US\$ 180. Over the course of the procurement, however, the costs of bidding led several companies to withdraw from the process, reducing the degree of competitive pressure. The Government eventually prequalified two bidders, both of which submitted a bid. The project was awarded to Fresenius, a German company. Fresenius signed a 10-year contract to finance, lease and operate four hemodialysis centres offering a minimum of 75 000 dialysis sessions, train health professionals from several public centres and develop home-based peritoneal dialysis services. As of May 2022, this contract is still in place, though the price per session (approximately US\$ 100) is now viewed by the Ministry of Health as higher than current market rates.

Reflecting on the transaction costs and operational costs of the PPP, policy-makers have opted to diversify their approach to private sector engagement in future to include direct contracting by the Mandatory Health Insurance Fund (MHIF) of hemodialysis providers on one-year contracts. These contracts are regarded as having a number of advantages over PPPs, including shorter procurement periods, greater flexibility in service provision and lower contract periods and costs. This experience helps to demonstrate that where an MHIF is in place and is capable of acting as a strong strategic purchaser, alternatives to PPPs exist and may in some cases represent a more affordable solution or superior value for money, taking into account the up-front transaction costs and long-term costs to government.

## 3.2 | Model 2. Health facility PPP

In this model, a private operator manages the design, construction, financing and operation of new and/or refurbished health facilities (such as multi-profile hospitals, ambulatory care facilities, polyclinics, primary care centres, and maternal and paediatric clinics). The model is distinct from the others examined in this chapter because its emphasis is on infrastructure and infrastructure-related services and not on health services per se – indeed, in this model, management of clinical services remains in the public sector.

Projects may incorporate outsourcing to the private sector of soft facilities management (such as catering, cleaning and laundry services), though this has become less common in recent years. Contracts typically last for a long period – 30 years or more – to enhance affordability of the annual payments (as is the case with a residential mortgage, a longer repayment period results in a lower annual payment amount, all else being equal). Payment to the private operator is made by government on the basis of availability charges (payment is made as, when and to the extent to which the specified assets and services are available), though this may be supplemented by co-payments.

As of May 2022, implementation of this model was complicated by gaps in Ukraine’s legal framework, meaning public authorities lacked the power to enter into contracts based on availability charges beyond a three-year period. Relevant changes to legislation on long-term budget obligations were intended to be adopted before the war. The relevant Government bill (Draft Law No. 5090 of 17.02.2021 “On amendments to the Budget Code of Ukraine regarding the regulation of budgetary relations during the implementation of agreements concluded within the public–private partnership framework, including concession contracts”) was adopted through its first reading in March 2021 and was scheduled to have its second reading in 2022.

Key features of this model include:

- long-term contracts – typically 30 years or more, and up to 60 years in some cases;
- the sharing of project-related risks between the public authority, private operator and investors/creditors, such that the private sector is exposed to financial losses if it fails to deliver assets on time/on budget;
- contracts based on a specified payment mechanism (the availability charge), which is analogous to a prospective global budget, albeit one that can be adjusted to a defined/limited extent according to performance;
- government ownership of the assets at the end of the contract, at which point all facilities and equipment must be handed over in reasonable condition; and
- the bundling of infrastructure, maintenance and, in some cases, non-clinical services within a single transaction, creating the potential for economies of scope and scale.

Payment to the private operator is made in full only if the specified infrastructure and services are made available and in accordance with the standards set out in the contract. The operator therefore has an incentive to deliver the specified infrastructure on time and to budget. It also is incentivized to ensure the infrastructure is well maintained and consequently is fit for purpose throughout the long contract period, as failure to do may lead to unavailability and penalties. Achieving this degree of risk transfer is dependent on a number of factors, including the ability of the authority to write effective contracts, verify performance against the contract and enforce its terms consistently. The authority must also be able to run a competitive procurement process to reduce excess profits and enable the state to capture a fair share of efficiency gains (those generated by risk transfer and economies of scope and scale). Consequently, achieving net benefits from this model requires that the authority has (or has access to) a high level of contracting expertise.

Even where such conditions hold, efficiency benefits may be offset by high transaction and financing costs. Dudkin & Väililä (9) showed that a sample of social infrastructure PPPs undertaken in the United Kingdom had higher precontractual transaction costs than would have been generated under alternative forms of procurement. These amounted to about 10% of the capital value of the projects on average for state authorities and the winning private sector bidders, and up to 5% of capital value for losing bidders (9). The authors attributed this to the long-term nature of PPPs, their complexity (especially due to the bundling of activities) and the emphasis placed on risk transfer. In addition, transaction costs accrue to private financing, including the additional fees equity investors must pay to their lenders, and to sellers of financial derivatives used to hedge against inflation and interest rate risks. These costs, which have no direct parallels in alternative forms of procurement, add to the operator's cost base and are factored into the availability charge paid by the authority. The rates of return on private finance (debt and equity) add to the costs to government of PPPs. The private operator's cost of capital will normally be a multiple of the interest rate on the government's debt and will be significantly higher than those observed in regulated industries (10).

Many governments are attracted to this form of PPP for reasons other than "value for money". Use of the model allows the budgetary recognition of capital expenditures to be deferred (the government pays only once the facilities are operational) and smoothed out (the up-front costs are repaid across the contractual term in a manner similar to a residential mortgage). The costs of PPPs cannot be avoided indefinitely, however, and the opportunity to defer and smooth out such costs can create perverse budgetary incentives, such as:

- a willingness to use PPPs even in cases where the model is unlikely to deliver value for money (where the benefits of risk transfer and bundling are offset by higher transaction and financing costs); and
- a propensity to overcommit future government revenues by, for example, entering into contracts that are too costly for the authorities and/or users that must ultimately pay the bill.

For this reason, international accounting rules have made it difficult for such costs to be accounted for off-budget (11). Even where accounting rules do allow for this, as appears to be the case in Ukraine, such rules are subject to periodic revision and it is possible that the debt will transfer back to the on-budget sheet at some point in future. This is more likely if there is to be alignment with EU financial rules. In addition, the IMF has advised that to avoid the fiscal risks associated with PPPs and the overinvestment problem they can create, governments should (12):

- develop and implement clear rules for private finance, including robust financial analysis to determine the extent of affordability of costs over the full period of the PPP contract;
- identify, quantify and disclose all PPP-related risks to government; and
- reform budget frameworks and government accounting procedures to capture all future costs in a comprehensive way, including both direct and conditional liabilities (liabilities that are only realized in certain circumstances, such as unforeseen changes in exchange rates, interest rates or inflation).<sup>1</sup>

As of May 2022, it was not clear that Government authorities in Ukraine had addressed this potential incentive problem, or if there were plans to do so. The International Finance Corporation (IFC) has stated that Ministry of Finance processes for assessing, accounting for and disclosing liabilities arising from PPPs are still new and the capacity to manage them is evolving (13). In this context, it may be beneficial for the Ministry of Finance to establish an overall control total for the use of health facility PPPs. Such a total provides a defined limit to the total value of all PPP liabilities that can be entered into in a given period, providing, in effect, a hard budget constraint for the Ministry of Health. While a control total does not eliminate the budgetary incentive to use PPPs over other forms of procurement (at least until the total is approached), it may help to stimulate a shift from a medium-term to a long-term budget-planning horizon and more disciplined prioritization of capital projects.

Projects of this type under consideration in Ukraine include the construction of a modern general hospital (on the basis of the Emergency Hospital in Lvov and which currently is at the pre-feasibility stage) and construction of an emergency wing of the Poltava Regional Clinical Hospital.

Box 2 describes an example of health facility PPPs in Türkiye.

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<sup>1</sup> Some liabilities are conditional in the sense that they only emerge in certain circumstances – for example, if a concessionaire defaults on its obligations to its creditors. Such liabilities are not always recorded by the public sector.

## **Box. 2. Health facility PPPs in Türkiye**

PPP contracts have been signed for 20 so-called city hospitals in Türkiye, with a total capital expenditure value of US\$ 11 billion. Türkiye has become an important source of inspiration for the use of PPP in Ukraine and other countries in the European Region. This is part of a wider process in which a number of investors – including commercial banks and multilateral development partners such as the EIB, EBRD and IFC – have been seeking to harness their experience of the PPP programme in Türkiye and apply it to other emerging markets.

According to recent media reports, however, the health minister of Türkiye has announced that there will be no further PPPs in the country and that all future hospital construction projects will be financed from government sources alone. The decision was taken after it emerged that payments for just 10 operational hospital PPPs accounted for some 27.8% of the Ministry of Health budget.

Key elements of the budgetary pressures created by the PPP programme in Türkiye include:

- the very large scale of the projects and the public revenue commitments they involve; and
- exchange rate volatility aggravating the budgetary challenge, as public revenue commitments were denominated in US dollars and the proportion of the Ministry of Health budget (denominated in Turkish lira) allocated to PPP payments had to be significantly increased as the lira depreciated against the dollar.

## 3.3 | Model 3. Integrated PPPs

A third PPP model has been considered as part of ongoing pre-feasibility studies for health sector projects in Ukraine (including targeted health facilities and services such as hospitals, ambulatory care facilities, polyclinics, primary care centres, and maternal and paediatric clinics). This model combines the contracting out of infrastructure-related and clinical services so is referred to as the integrated model. PPPs of this form are very rare. Examples include projects in Valencia, Spain and Maseru, Lesotho, though the latter contract was terminated prematurely (14).

Their scarcity reflects their complexity. Successful implementation depends on the public authority having (or having access to) substantial contracting expertise. Writing effective contracts for the full range of complex, interconnected services provided in a modern hospital is extremely challenging. The authority must be able to define indicators to measure performance across services. It must be capable of establishing a robust monitoring apparatus and ensuring that services are being delivered to the standard. It must design a payment mechanism that leads to stability of future costs, without imposing unmanageable financial burdens on the private operator (generally, private operators prefer volume-based payments, but this may lead to excessive volumes of services being provided due to, for instance, supplier-induced demand, leading to excessive costs, while availability charges and global budgets expose the operator to financial losses if volumes exceed those expected.) Finally, the authority must have the budgetary capacity to plan for and execute the payments, including any unforeseen variation.

Although this model has been examined as part of (ongoing) pre-feasibility studies for individual projects, it is unclear if, or when, it will be used in practice. Currently, the model is perceived as being more aspirational than practical, and officials acknowledge that it may not be viable until the PPP market in Ukraine has further matured. This is a sensible approach.

One reason for the model receiving attention in Ukraine is that a legal framework for its implementation already exists, unlike the health facility PPP model (Article 1 of the Law of Ukraine “On concessions” from 03.10.2019, No. 155-IX). Implementation of the model through the concession framework would only be possible, however, if the majority of the private operator’s income comes from service users, as public funding would be allowable only for specific purposes (such as purchasing a certain volume of services provided by the operator and/or co-financing of capital expenditure to address any viability gap relating to the economics of the project).

In this case, payment to the operator would come from:

- payments by end users, most of them out of pocket; and
- payments by the NHSU for services provided to end users in accordance with Part 1 of Article 4 of the Law of Ukraine “On public financial guarantees of medical services”, under which the state guarantees full payment for the primary and secondary care services outlined in the Programme of Medical Guarantees.

Evidently, implementation of concessions would raise significant concerns about equity of access and financial protection for patients.





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## 4 ■ OPPORTUNITIES AND CHALLENGES FOR UKRAINE'S HEALTH SECTOR

Owners of health facilities (at hromada, city, oblast and national levels) and the NHSU need to have the right incentives and capacities to make effective use of PPPs, to select and manage projects, and to identify and mitigate the risks relating to them. Government needs to establish a clear, predictable and transparent institutional framework supported by competent and well resourced authorities, grounding the selection of PPPs in value for money at project and health system levels and using the budget process transparently to minimize fiscal risks and ensure the integrity of the procurement process. In addition, there are areas in which investors will require greater certainty before being willing to invest. Establishing health system readiness for the use of PPPs means strengthening the governance framework for implementation, focusing on four key areas: strategic and capital planning; long-term budgetary planning; building organizational capacity; and ensuring that PPPs are used strategically to the long-term benefit of Ukraine's health system.

## 4.1 | Strategic and capital planning

PPPs will fail to strengthen Ukraine's health system unless they are embedded in a needs-based investment plan that defines the future shape of the provider network. It is important that PPPs are used only when they are assessed to be the best tool through which to achieve the strategic priorities set for the health system overall. This means confirming:

- which existing facilities need to be retained to deliver the services that authorities in Ukraine want to provide and where they want to provide them (for example, identifying which hospital facilities are actually capable of delivering the services in the Programme of Medical Guarantees at the required level of quality and should therefore be prioritized for capital investment);
- which new facilities are needed to achieve greater organizational efficiency and enable new models of care to be realized so prioritized services can be provided at the most efficient and appropriate level (for example, the long-intended shift from inpatient to outpatient care);
- how do the net benefits of PPPs (taking into account transaction and financing costs) compare with other feasible delivery modalities (such as subcontracting by public providers and/or direct contracting by health-care payers); and
- what relationship will be developed between the planned PPP facilities and the other provider organizations in the health system and with other owners and payers in that system.

Regarding the first point, the existing health estate in Ukraine is poorly configured, out of date and in a parlous state of repair, meaning maintenance and utility costs are high and service quality is compromised. Even before the war, many facilities needed total reconstruction rather than piecemeal refurbishment; now, of course, many facilities have been completely or partially destroyed by military action. Hospital closures will be required, with services re-established in new consolidated facilities or outside of hospitals. The World Bank and the United States Agency for International Development were providing technical support to help address these challenges before the war, but there are significant barriers to progress, each of which will need to be addressed and some of which may require changes to legislation and regulations, including:

- current laws that make it difficult for public authorities to sell assets, including land, even if they have an incentive to do so;<sup>2</sup>
- fragmented ownership of hospitals and other facilities in need of consolidation (making any strategic planning technically and politically difficult to achieve); and
- restrictions on the ability of hospital owners to redirect staff to where they are most needed.

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<sup>2</sup> Currently, the NHSU tariff does not attempt to cover the cost of capital. Providers do not have a formal balance sheet structure and do not pay any interest/dividend/capital charge costs. In this context, there is no financial incentive to use physical assets efficiently or sell them, even where this appears to make economic sense.

There are currently no coordination mechanisms across planning levels or geographical areas, and there will need to be some oversight function at national level to ensure quality and consistency and to resolve potential gaps, overlaps, duplication of services and conflicts within or between regions. Oblasts do not currently have authority to direct the territorial hromada and municipalities that own most health facilities. In addition, oblasts could have conflicts of interest that may need to be monitored, and there may be disagreements between oblasts in terms of the locations and scope of services provided within hospitals and other health facilities.

Attention will therefore need to be given to the overall governance of the planning process, the development of tools and capability to support complex planning, and the Government may want to develop criteria for assessing the quality of plans.

Addressing these challenges will require a broad menu of procurement options, and it will be important to avoid a PPP monoculture in which PPP becomes the only available option due to an overly centralized approach and/or public capital budget constraints. In Ukraine (as elsewhere), the PPP agenda is highly centralized in government (15). This is understandable due to the need for specialist expertise, but it is important that it does not lead to prioritization of form over function, such that investment decisions are made not on the basis of service area needs, but on the basis of which service area is the best fit for delivery under a PPP. In the reconstruction and recovery period, both national and development partner investors in the health system will need to avoid creating fixed and sizeable allocations of future revenues to service areas that would, in the absence of PPPs, not be prioritized.

## 4.2 | Financing the long-term costs of PPP contracts

Currently, funding for capital and maintenance costs flows through a different route to that for payment for services and forms part of local authority funding. This complicates the process of paying PPP fees, which have to cover both. Either the funding for public authorities such as municipalities and the NHSU will need to be increased to allow for increases in tariffs to be paid, or some other mechanism will be required to ensure affordability. A complicating factor is that it appears the funding received by local authorities includes maintenance costs and an allowance for capital spending that covers all the public services for which they are responsible. Reserving a portion of this to fund PPP costs might have negative implications for other services by creating further inflexibility in the use of funds.

It is also possible that the maintenance costs of new buildings will be higher than those of existing hospitals, as maintaining buildings to a high level will be a contractual requirement (as well as something the operator is incentivised to do, as discussed). Current hospitals in Ukraine are not maintained to this level. While there may be some offsetting cost reductions (such as new buildings requiring fewer repairs), it will be important to ensure that there is a flow of funds to finance above-average infrastructure-related costs. There may be a similar issue with utility costs, unless building designs enable efficiencies in use of energy. These costs are additional to the burden of the higher transaction and financing costs associated with the PPP approach, as described above.

Informal payments can also create challenges for PPP contracts, particularly those in which clinical staff are employed by the private sector. In these cases, operators will (or should) require that the tariffs they charge to the public authority are sufficient to cover full economic costs, including salaries, and not only a fraction of the cost that historically has been paid by the state.

However tariffs are defined, it is important to curtail the potential for overinvestment. Analysts often underestimate the direct and conditional liabilities of PPPs when conducting project appraisals. Such underestimates may be caused by technical errors due to the inherent difficulty of predicting future costs and benefits, but optimism bias (the tendency of organizations to underestimate future costs) and strategic misrepresentation (the deliberate attempt to distort forecasts of future costs) also play a role. Such errors can lead to the commissioning of unaffordable contracts, which, at large scale, can undermine the financial sustainability of the health system and its capacity to meet need (5).

Mitigating such risks requires sources of independent scrutiny, such as public audit institutions (further guidance on the role of supreme audit institutions in providing independent scrutiny of, and challenge to, PPP projects and programmes can be found in the *Public-private partnerships reference guide, Version 3 (16)*).

The attitudes of investors have important implications for the viability of a government's PPP policy, and the funding environment in which contracts are embedded will be key. Investors favour mature markets in which PPP mechanisms are well understood. They need to be confident in the legal and public policy framework underpinning the use of PPPs, and that solutions to specific issues, such as how disputes will be adjudicated, are clear (authorities in Ukraine may need to accept that contracts will be subject to adjudication in other jurisdictions). Any uncertainty over the basis of payment will reduce investor appetite and increase costs. Draft Law No. 5090 of 17.02.2021 "On amendments to the Budget Code of Ukraine regarding the regulation of budgetary relations during the implementation of agreements concluded within the public-private partnership framework, including concession contracts", which aims to introduce the right of state authorities to commit to long-term budgetary liabilities under PPPs, is likely to play an important role in supporting investor confidence. To be clear, however, this is not the same as a state guarantee that would provide investors with a guaranteed revenue stream regardless of their level of performance.

## 4.3 | Strengthening capacity to undertake effective PPP projects and programmes

Achieving successful outcomes from PPP projects and programmes requires investment in organizational capabilities. Currently, capacity is limited throughout government. Some staff of the Ministry of Health have recently completed the public-private partnerships certification programme of APMG International (17), but this is no more than a promising first step. Experience with smaller, simpler models of engagement (such as managed equipment services contracts) can be a good place to begin – learning by doing and building organizational capability before moving on to larger and more complex projects, such as PPPs. There is also scope for the Ministry of Health and NHSU, working with the World Bank/IFC and other international partners, to draw on the experiences of decision-makers in municipalities (such as Lvov) where experience with contracting is relatively advanced to synthesize and disseminate best practices to other localities.

Decisions will need to be made about which public authorities will do contracting. Some activities (such as monitoring) will need to be carried out close to the facilities and be closely connected to facilities' management. In many cases, this will need to be undertaken by the hospital organization itself, suggesting a need for additional management capacity (which will be required in any case if the organizational autonomy agenda is to be pursued further in the health sector). If such investments in management capacity are not forthcoming, additional capacity at city, oblast or hromada level may need to be put in place (depending on which entity owns the relevant facilities). In the United Kingdom, the Department of Health provided expertise on PPP and created networks to exchange learning and knowledge between different parts of the health-care system; this also supported the development of expertise and reduced costs and should be considered for Ukraine.

## 4.4 | Focusing on function, not form

In the post-war environment, the necessary reconstruction and reconfiguration of the health estate is likely to face several obstacles, regardless of which procurement route is adopted. The creation of autonomous provider entities before the existence of a coherent (master) plan for the estate may impede consolidation. The current building guidance for hospitals is out of date and does not form an adequate basis for the specification of new hospitals. Private operators can be asked to develop their own designs, but these will need to be quality assured and compared with international standards. Where possible, medical professional associations should be involved in such processes, not only as a source of expertise, but also as a means of independent scrutiny and challenge. It will be important to ensure agreement on minimum standards for a wide range of issues about, for example, room sizes, layout, ventilation and engineering before any contracts are signed.

In Ukraine, as elsewhere, the PPP agenda is highly centralized, with policy formulation led by the Ministry for Economic Development, Trade and Agriculture, then in effect transplanted into the Ministry of Health (alongside departments responsible for the road, rail and energy projects that have also been prioritized to move forward under project finance/PPP programmes), and then on to individual city-, oblast-, or hromada-level authorities (15). This approach has been observed in multiple other countries, from the United Kingdom to Uzbekistan, and is understandable given the complexity of this area of policy-making. The approach nevertheless can lead to a prioritization of form over function, meaning that analysis too often begins with an assumption that a PPP will be used, and then proceeds to find a problem to which it can be applied. This generates risks that PPPs may be used for projects that are: (a) poorly aligned with service delivery priorities (reflected, for example, in the Programme of Medical Guarantees) and the strategies that exist to ensure these are delivered to the population in line with key principles for health system recovery and transformation in Ukraine (18); and (b) do not represent value for money. These risks to allocative and productive efficiency are amplified if city-, oblast- or hromada-level authorities are provided with subsidies tied to the use of the PPP procurement route.

In addition, all large public procurements create opportunities for corruption, and PPPs (especially models 2 and 3) may aggravate these by virtue of their costs and complexity.

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## 5 ■ SUMMARY

As of May 2022, the social, economic and political situation that will face policy-makers in post-war Ukraine is unknown. It nevertheless is clear that the health-care infrastructure of the country has been severely damaged (as of 11 May 2022, WHO had verified 230 military attacks on health facilities). It is probable that reconstruction efforts will occur in a context of severe constraints on Government spending alongside large-scale external support. Successful health system reconstruction includes effective planning, coordination and leadership. In Ukraine, the Government will need to ensure that plans for capital investments and service delivery reforms are well coordinated, targeted to address long-standing shortcomings and conflict-related destruction, and implemented effectively. The use of PPPs can play a role in supporting the achievement of these outcomes, albeit only in certain conditions.

To establish these conditions, the Government will need to establish a clear, predictable and transparent governance framework for the management of capital investment projects and programmes, supported by competent and well resourced public organizations. The selection of the PPP model (or models) needs to be grounded in value for money, which means, among other things, giving authorities a credible menu of good, feasible procurement options and avoiding a PPP monoculture in which PPP becomes the only option, rendering value-for-money appraisals largely meaningless. Where PPPs constitute value for money, the budgeting process must be sufficiently transparent to minimize fiscal risks. Given the observed scope for private finance to be used almost like a credit card for governments, often leading to overinvestment in expensive capital assets, the role of official auditors will be critical. The transparency of, and accountability for, investment decisions are important in ensuring that PPPs can increase organizational efficiency in the health system, enhancing its capacity to address population health needs (19). Such oversight is also needed to safeguard the integrity of the procurement process and avoid corruption.



Supporting laws, policies and capabilities need to be in place to ensure that the maximum benefit is obtained from related expenditures. These include the need to develop stronger organizational capacity to plan, design and implement PPP projects and for the strategic planning of health-care services more generally. Sources of support for capacity-building exist within development partners such as the EIB, the EBRD and the World Bank/IFC. Ultimately, however, domestic capacity in Ukraine itself – particularly in the NHSU – will be needed to guarantee sustained performance. The capabilities of the owners of hospitals and other health service providers to deal with complex contracts will also need to be developed. A sensible approach is to start small and develop contracting expertise through experience of relatively manageable transactions. The risks and challenges of, for example, managed equipment services contracts should not be underestimated, but addressing them can help to enable learning by doing.

Moving forward, it is important that decision-makers are aware of, and take action to prepare to address, a number of challenges. For example, challenges relating to PPPs of model 1 include:

- ensuring adequate competition in procurement;
- establishing efficient prices;
- specifying standards for facilities, equipment and clinical services in legal contracts;
- defining (and enforcing) payment mechanisms;
- establishing strong monitoring arrangements and contract management expertise;
- dealing with moral hazard problems among referrers (such as methods to monitor or forbid referral to diagnostic services by those with a financial interest in it);
- embedding specialist services provision in the scope of whole care pathways; and
- avoiding the temptation to develop too many projects in parallel.

For models 2 and 3, allocative efficiency depends in part on the degree of alignment with plans for the future shape of the health estate, including the re-balancing of provision between inpatient and outpatient settings. For example, rationalization of multiple hospitals onto larger single sites and the complete rebuilding of some hospitals will be needed and will require area-level master-planning. Despite the work being undertaken by development partners in such areas, challenges remain. In particular, changes in payment systems and the approach to performance monitoring still need to be carefully assessed. Local expertise and capability to allow authorities to act as proactive and intelligent partners still need to be created and institutionalized. Mechanisms for sharing expertise and creating an effective central repository of information and guidance will be very helpful steps in support of this.

Further work is required to understand the mechanisms for funding model 3. If it is implemented via the current Concession Law, which would require at least a substantial proportion of provider revenues to be generated via user fees, this would lead to a significant erosion of equity of access and financial protection, and would therefore be poorly aligned with current health system policy frameworks.

All PPP models, but particularly those that create budgetary liabilities spanning decades, require mechanisms for external independent scrutiny, including involving national and/or local auditors, ensuring value for money and transparency, and preventing corruption. Currently, public audit authorities in Ukraine do not have a mandate to undertake retrospective value-for-money assessments. This is a gap in the institutional structure in Ukraine that would be useful to correct, for this purpose and many others. As noted, such scrutiny should also consider questions of affordability for individual public authorities, the health system and the Government.

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## The WHO Regional Office for Europe

The World Health Organization (WHO) is a specialized agency of the United Nations created in 1948 with the primary responsibility for international health matters and public health. The WHO Regional Office for Europe is one of six regional offices throughout the world, each with its own programme geared to the particular health conditions of the countries it serves.

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