

Report of the Medicines Patent Pool Expert Advisory Group on the Proposed Licence Agreement with Tandem Nano Ltd on Long-Acting Technologies for HCV, TB, and Malaria Treatment

Introduction

The Expert Advisory Group (EAG) of the Medicines Patent Pool (MPP) submits the following report to the Governance Board of the Medicines Patent Pool (Board) on the proposed License Agreement (the Agreement) between MPP and Tandem Nano Limited (TNL) for long-acting injectable technologies (LAI) that may provide for efficacious exposure to medicines for treatment and/or prevention of hepatitis C virus (HCV), tuberculosis (TB), and malaria.

This report reflects the outcome of a consultation with the EAG, chaired by Peter Beyer. In addition to the EAG members, the consultation included Nathan Ford, Wim Vandevelde, and François Venter of the Scientific Advisory Panel (SAP).

The Terms of Reference for the EAG pose two questions that the EAG must address in assessing draft license agreements: (i) do the negotiation results sufficiently meet the requirements set out in the Statutes, and (ii) do the negotiation results offer sufficient added value over the *status quo*?

Having reviewed the proposed Agreement , the EAG answers both questions in the affirmative and recommends that the Board requests the Executive Director of MPP to finalise and execute the necessary documents with TNL.

Background, Overview of the Proposed Agreement

In early 2020, Unitaid announced several projects relating to the development of long-acting technologies, including the LONGEVITY project led by the University of Liverpool (UoL) for the development of LAI for the treatment and/or prevention of HCV, malaria, and latent TB. Cumbersome daily pill regimens for the treatment and/or prevention of diseases such as malaria, TB, and HCV can lead to well-known problems of patient adherence to regimen and/or improper use that can diminish the impact of otherwise effective medicines. Unitaid's projects on long-acting technologies seek to improve patient outcomes by replacing these regimens with formulations, such as injectables, that can last for extended periods of time and thereby obviate the need for daily pills.

UoL's LAI candidates are based on solid drug nanoparticles (SDN) manufactured using emulsion-templated freeze-drying or spray-drying technology designed for high drug loading, extended release, and broad applicability.

Unitaid's grant to UoL requires that TNL (as UoL's for-profit spin-off) license the LAI to MPP. The grant agreement specifies terms and conditions governing the future licensing to MPP as well as the subsequent development and ultimate commercialisation of products relying on the TNL LAI. These conditions align with MPP's own statutory requirements for licences which are reflected in this proposed Agreement.

MPP entered negotiations with TNL for LAI in March 2020 and first briefed the EAG on the negotiations in November 2020.



The framework for the proposed Agreement with TNL is similar to MPP's previous agreement with University of Liverpool for SDN technology (2015). Through the Agreement, TNL would license to MPP all patents and know-how necessary for the manufacture of long-acting formulations of (i) atovaquone for malaria chemoprophylaxis; (ii) rifapentine and a novel isoniazid prodrug for the prevention of TB; (iii) glecaprevir and pibrentasvir for treatment of HCV; and (iv) bedaquiline and/or delaminid for the prevention of TB (if data supporting their use in TB prevention emerges). As with the 2015 MPP-UoL SDN agreement, the licence from TNL to MPP would allow MPP to grant two types of non-exclusive, non-transferable, and royalty-free sublicences

- one for development partners to be able to develop licensed products anywhere in the world, and
- one for commercialisation partners to commercialise the licensed products in the Field (prevention and/or treatment of malaria, TB or HCV) and in the Territory, consisting of all low- and middle-income countries.

Unlike the 2015 SDN agreement, this proposed Agreement contains two decision points designed to provide some flexibility in addressing questions that may arise given the variety of licensed products and the challenges for development and commercialisation that may be unique to certain of those products. The first is to determine whether a development partner is necessary for the respective product. The second is to agree on the optimal commercialisation strategy and incentive mechanisms most appropriate to the respective licensed product.

Assessment of the Proposed Collaboration in Light of MPP's Statutes

MPP's Statutes contain guiding principles against which the draft license agreements are assessed. The EAG finds that the proposed collaboration meets the requirements in the Statutes, as summarised in the table below.

Relevant Considerations in the Statutes of the Medicines Patent Pool

Statutes	Terms in Proposed Licence
Negotiating terms and conditions of licence agreements with aim to maximize public health benefits, taking into account the Global Strategy and Plan of Action on Public Health, Innovation and Intellectual Property of the WHO (GSPOA); WTO Doha Declaration Entering into licence agreements with patent holding entities, and sublicence agreements with generic manufacturers and other appropriate sublicensees on a non-exclusive and no-	 Provisions ensuring that sales inside or outside the Territory are not a breach of the Agreement if the sales do not infringe TNL intellectual property (as, for example, if a compulsory licence has been granted) or use TNL know-how. MPP to enter into non-exclusive licences with development partners and commercialization partners.
discriminatory basis As and when necessary, enforcing terms and conditions of licence agreements, with appropriate dispute resolution mechanisms Requiring stringent quality criteria for licensed	 MPP takes on significant obligations to monitor and enforce terms of development and commercialization agreements; specifies dispute resolution process with senior executives. Requires all licensees seek approval from
Requiring stringent quality criteria for licensed products	•



Review Panel, US FDA, and/or other WHO Listed Regulatory.
Licensees required to mark licensed products with language stating that the product is sold under licence from MPP.

Assessment of the Proposed Collaboration in Light of the Status Quo

The EAG finds that the proposed Agreement represents a significant added value over the *status quo*, due to, *inter alia*, the transparent, public health-oriented terms and conditions and a broad geographic territory encompassing all low- and middle-income countries.

Successful development of the LAI has the potential to improve affordable access to TB, HCV, and malaria medicines for underserved and vulnerable populations. The long-acting technologies in this proposed licence have the potential to alleviate certain challenges in the fields of TB, HCV and malaria under existing prevention and treatment regimens, whether pill burden, stigma, or poor uptake, and may yield economic savings that would allow health systems to stretch their budgets further. With HCV, for example, while advances in treatments in recent years have been tremendously important, a long-acting injectable formulation holds the potential of replacing several weeks' worth of pills with one single curative injection – easier both for patients and medical infrastructure.

The EAG has in the past encouraged MPP to continue to focus on upstream interventions to improve access. This Agreement offers a roadmap to move from development through commercialization that could benefit a wide array of parties through a variety of different products. The Agreement demonstrates that working with R&D funders such as UNITAID can increase MPP's leverage in obtaining optimal terms otherwise not possible when acting alone.

The EAG's suggests that MPP be informed regularly and timely of any change in the TNL led development programme in relation to the licensed technology. The EAG further acknowledges that MPP is part of the Longevity consortium which comprises, *inter alia*, TNL and UNITAID, where the information on the development progress is shared in regular call and meetings.

Recommendation

The EAG concludes that the proposed Agreement with TNL is consistent with MPP's mandate as defined in its Statutes and represents a significant improvement over the *status quo* in terms of the public health-oriented nature of the licensing terms and conditions. Therefore, while emphasising the importance of expanding the territory of the license agreement with Abbvie as the holder of patent rights in glecaprevir/pibrentsavir. The EAG recommends that the Medicines Patent Pool Governance Board request the Executive Director to sign the proposed Agreement between TNL and MPP.

Peter Beyer

Chair, Expert Advisory Group

Date: 19 August 2021