



INNOVA4TB Mid-Term Online Meeting

7th July 2020

Project Full Title: Innovation in Tuberculosis

Grant Agreement Number: 823854

Agenda

09:30h Welcome and Introduction

Jose Dominguez (Consortium Coordinator)

Raquel Jiménez-Frías (Project Adviser. European Commission)

09:40h General status of the project

- Management and training. *Jose Domínguez (Coordinator)*
- COVID-19 contingency plan. *Jose Domínguez on behalf Steering Committee*
- Secondments implementation. *Bàrbara Molina (Project Manager)*
- Financial aspects. *Vanessa Llobet (International Project Office IGTP), Bàrbara Molina (P.Manager)*
- Ethics requirements. *Jose Domínguez (Coordinator)*
- Communication, dissemination and exploitation. *Olena Rzhepishevskya (UmU), Raquel Villar (IGTP)*

10:30h Coffee break

10:45h Research Activities

- WP2. Host-pathogen interaction. *Cristina Prat (IGTP)*
- WP3. Development of new diagnostic methods. *Jose Domínguez (IGTP), Valeriu Crudu (IFTIP)*
- WP4. Development of M/XDR-TB detection tests. *Andrii Dudnyk (PMU)*
- WP5. Improvement of TB therapy strategies. *Alicia Lacoma (CIBER)*

11:45h Coffee break

12:00h Summary of outputs of the Consortium, and future perspectives in the COVID-19 scenario

Open discussion. Including all partners and beneficiaries and Project Adviser

13:30h Overview of the progress of the project and recommendations

Raquel Jiménez-Frías (Project Adviser)

14h Lunch

15:30h Meeting between seconded staff members and the REA Representative

Seconded staff and Raquel Jiménez-Frías (Project Adviser)

The team leaders are not allowed to participate in this meeting

16:30h End of the meeting

CLINICAL STUDIES BY WP

WP2. Study of the Host-Pathogen interaction

1. Study and detection of primary immune-deficiencies in paediatric population in different settings.
2. Characterization of specific T-cell markers for diagnosing active and latent TB infections.
3. Detection of *M. tuberculosis* in nasopharyngeal mucosa.
4. To identify specific biomarkers of latency and risk of progression.
5. Transcriptomic approach searching for a specific blood signature of progression to active TB
6. Study of primary immunodeficiencies by whole exome sequencing

WP3. Development of new diagnostic methods

1. MPT64 antigen detection by ICT in urine for diagnosing active TB.
2. Characterization of a specific profile of urinary metabolome in active TB patients.
3. Detection of tuberculosis organic volatile compounds by means of an E-nose.
4. Develop new signal systems based on nanoparticles for *M. tuberculosis* antigen.
5. Development of specific software for X-Ray automated analysis.
6. Automatic system for reading smears
7. Detection of *M. tuberculosis* in oral mucosa.
8. Assessment of a new paediatric diagnostic algorithm based on clinical and analytical variables.
9. Development of a new device for stimulating the growth of the bacteria during the transport.

WP4. Development of tests for M/XDR-TB detection.

1. Validation of a new point-of-care method for detecting drug resistance.
2. Evaluation of a LPA and 96well platform for detecting resistance against the 1st and 2nd line drugs.
3. Development of a GeneXpert Ultra Consensus Document.
4. Evaluation of a deep-sequencing platform for molecular characterization and resistance detection.
5. Development new generation of LPA for detecting resistance to the new drugs for MDR-TB.

WP5. Development of new therapeutic strategies.

1. Study of cell surface markers during active TB treatment, as potential tools for monitoring treatment.
2. Metabolomic urine profile to monitor adherence and treatment response
3. Discover new compounds with anti-TB activity from Black Sea bacteria.
4. Evaluating the activity of Gallium against *M. tuberculosis* in an in-vitro model.
5. Exploring the utility of encapsulating new anti-TB compounds for improving efficacy.