

Technology, Employment and Industrial Dynamics: Theory and Empirical Evidence

7TH AND 8TH APRIL, 2022

Scuola Superiore Sant'Anna, Pisa, Italy

DAY 1 – 7TH APRIL

14:00 – Opening address

DANIELE MOSCHELLA (Scuola Superiore Sant'Anna)

MARCO VIVARELLI (Università Cattolica del Sacro Cuore) – Project Principal Investigator

14:15 – Keynote address

ALFRED KLEINKNECHT (Delft University of Technology) “*Why is productivity growth so low (in the age of artificial intelligence and robots)?*”

Chair and Discussant: MARCO VIVARELLI (Università Cattolica del Sacro Cuore)

15:15 – Session 1: Technology, employment and skills

Chair: ANDREA MINA (Scuola Superiore Sant'Anna)

LIUCHUN DENG (Yale-NUS College), STEFFEN MÜLLER (Halle Institute for Economic Research), VERENA PLÜMPE (Halle Institute for Economic Research), JENS STEGMAIER (Institute for Employment Research) “*Plant-Level Effects of Robot Adoption*”

DISCUSSANT: Dario Guarascio (Sapienza-Università di Roma)

ALESSANDRO STERLACCHINI (Università Politecnica delle Marche) “*AI patenting and employment: Evidence from the worlds' top R&D investors*”

DISCUSSANT: Jacopo Staccioli (Università Cattolica del Sacro Cuore)

MATTIA PEDOTA (Politecnico di Milano), LUCA GRILLI (Politecnico di Milano), LUCIA PISCITELLO (Politecnico di Milano) “*Technology adoption and upskilling in the wake of Industry 4.0*”

DISCUSSANT: Valeria Cirillo (University of Bari)

ANTONIO MARTINS-NETO (UNU-MERIT), XAVIER CIRERA (World Bank), ALEX COAD (Waseda Business School) “*Job displacement and routine-intensive occupations: evidence from a developing country*”

DISCUSSANT: Armanda Cetrulo (Scuola Superiore Sant'Anna)

17:15 coffee break

17:30 – Session 2: Innovation and the firm

Chair: NICOLETTA CORROCHER (Bocconi University)

ILYA MANUYLOV (Aarhus University) “*The Role of ‘Research’ and ‘Development’ in Technology Upgrading of a Firm*”

DISCUSSANT: Arianna Martinelli (Scuola Superiore Sant'Anna)

SARA AMOROSO (European Commission), RANDOLPH LUCA BRUNO (University College London), LAURA MAGAZZINI (Scuola Superiore Sant'Anna) “*The identification of time-invariant variables in panel data model: exploring the nexus between appropriability and productivity in highly innovative and globalised companies*”

DISCUSSANT: Piotr Dzikowski (University of Zielona Góra)

20:30 social dinner

10:00 – Session 3: Direction and nature of innovation

Chair: [DANIELE MOSCHELLA](#) (Scuola Superiore Sant'Anna)

[MARTINA IORI](#) (Scuola Superiore Sant'Anna), [ARIANNA MARTINELLI](#) (Scuola Superiore Sant'Anna), [ANDREA MINA](#) (Scuola Superiore Sant'Anna) *“The direction of technical change in AI and the trajectory effects of government funding”*

DISCUSSANT: Gianluca Capone (University of Parma)

[CARL BENEDIKT FREY](#) (University of Oxford), [GIORGIO PRESIDENTE](#) (University of Oxford) *“Data-Biased Innovation”*

DISCUSSANT: Simone Maria Grabner (Università Cattolica del Sacro Cuore)

[IMAD EL-HAMMA](#) (CNAM), [NATHALIE GREENAN](#) (CNAM), [SILVIA NAPOLITANO](#) (CNAM) *“Using a linked dataset at the EU wide level to describe technological and organisational changes and their relationship with innovation”*

DISCUSSANT: Fabio Montobbio (Università Cattolica del Sacro Cuore)

11:30 – Keynote address

[GUIDO BUENSTORF](#) (University of Kassel) *“Entrepreneurship as a driver of innovation and industry evolution: from evidence to intervention”*

Chair and Discussant: [GIOVANNI DOSI](#) (Scuola Superiore Sant'Anna)

12:30 lunch break

14:00 – Session 4: Innovation and the labour market

Chair: [FABIO MONTOBBIO](#) (Università Cattolica del Sacro Cuore)

[MARIO PIANTA](#) (Scuola Normale Superiore), [JELENA RELJIC](#) (Scuola Superiore Sant'Anna) *“The good jobs-high innovation virtuous circle”*

DISCUSSANT: Chiara Mussida (Università Cattolica del Sacro Cuore)

[STEFANO DUGHERA](#) (University of Turin), [FRANCESCO QUATRARO](#) (University of Turin), [ANDREA RICCI](#) (INAPP), [CLAUDIA VITTORI](#) (Roma Tre University) *“Technological externalities and wage premium: new evidence from Italian labor markets”*

DISCUSSANT: Nicoletta Corrocher (Bocconi University)

[FILIPPO BELLOC](#) (University of Siena), [GABRIEL BURDIN](#) (Leeds University), [FABIO LANDINI](#) (University of Parma) *“Robots, Digitalization, and Worker Voice”*

DISCUSSANT: Maria Enrica Virgillito (Scuola Superiore Sant'Anna)

[ILONA PAVLENKOVA](#) (University of Tartu), [LUCA ALFIERI](#) (University of Tartu), [JAAN MASSO](#) (University of Tartu) *“Effects of Automation on the Gender Pay Gap: the case of Estonia”*

DISCUSSANT: Daniele Moschella (Scuola Superiore Sant'Anna)

16:00 – Closing wrap up

[MARCO VIVARELLI](#) (Università Cattolica del Sacro Cuore) – Project Principal Investigator

[ANDREA MINA](#) (Scuola Superiore Sant'Anna)

17:00 farewell coffee

List of participants (in alphabetical order)

Name	Surname	Affiliation	Email
Randolph Luca	Bruno	University College London	randolph.bruno@ucl.ac.uk
Guido	Buenstorf	University of Kassel	buenstorf@uni-kassel.de
Gianluca	Capone	University of Parma	gianluca.capone@unipr.it
Armanda	Cetrulo	Scuola Superiore Sant'Anna	armanda.cetrulo@santannapisa.it
Valeria	Cirillo	University of Bari	valeria.cirillo@uniba.it
Nicoletta	Corrocher	Università Bocconi	nicoletta.corrocher@unibocconi.it
Giovanni	Dosi	Scuola Superiore Sant'Anna	giovanni.dosi@santannapisa.it
Stefano	Dughera	University of Turin	s.dughera@unito.it
Piotr	Dzikowski	University of Zielona Góra	p.dzikowski@wez.uz.zgora.pl
Simone Maria	Grabner	Università Cattolica del Sacro Cuore	simone.grabner@unicatt.it
Dario	Guarascio	Sapienza-Università di Roma	dario.guarascio@uniroma1.it
Martina	Iori	Scuola Superiore Sant'Anna	simone.martina.iori@santannapisa.it
Alfred	Kleinknecht	Delft University of Technology	alfred.kleinknecht@gmail.com
Fabio	Landini	University of Parma	fabio.landini@unipr.it
Ilya	Manuylov	Aarhus University	imanuylov@econ.au.dk
Arianna	Martinelli	Scuola Superiore Sant'Anna	arianna.martinelli@santannapisa.it
Antonio	Martins-Neto	UNU-MERIT	martinsneto.as@gmail.com
Jaan	Masso	University of Tartu	jaan.mass@ut.ee
Andrea	Mina	Scuola Superiore Sant'Anna	andrea.mina@santannapisa.it
Fabio	Montobbio	Università Cattolica del Sacro Cuore	fabio.montobbio@unicatt.it
Daniele	Moschella	Scuola Superiore Sant'Anna	daniele.moschella@santannapisa.it
Chiara	Mussida	Università Cattolica del Sacro Cuore	chiara.mussida@unicatt.it
Silvia	Napolitano	CNAM	silvia.napolitano@lecnam.net
Ilona	Pavlenkova	University of Tartu	ilona.pavlenkova@ut.ee
Mattia	Pedota	Politecnico di Milano	mattia.pedota@polimi.it
Verena	Plümpe	Halle Institute for Economic Research	verena.pluemp@iwh-halle.de
Giorgio	Presidente	University of Oxford	giorgio.presidente@oxfordmartin.ox.ac.uk
Jelena	Reljic	Scuola Superiore Sant'Anna	jelena.reljic@me.com
Jacopo	Staccioli	Università Cattolica del Sacro Cuore	jacopo.staccioli@unicatt.it
Alessandro	Sterlacchini	Università Politecnica delle Marche	a.sterlacchini@staff.univpm.it
Maria Enrica	Virgillito	Scuola Superiore Sant'Anna	mariaenrica.virgillito@santannapisa.it
Marco	Vivarelli	Università Cattolica del Sacro Cuore	marco.vivarelli@unicatt.it

Acknowledgements

The organisers acknowledge support by the project “*Technological change, industry evolution and employment dynamics*” funded by the MIUR Progetti di Ricerca di Rilevante Interesse Nazionale (PRIN) Bando 2017 – grant no. 201799ZJSN.