

# SAMF Talent Track Application

Seetha Menon

Health economics, a substantial and growing field within economics, has greatly contributed to our understanding of the determinants of health and the economic consequences of ill-health. My PhD dissertation, and subsequent publications in top journals, have examined these determinants and economic consequences across different countries and in various domains such as cardiovascular risk<sup>1</sup>, domestic violence<sup>2</sup>, survival expectations<sup>3</sup>, child mortality<sup>4</sup>, and job quality<sup>5</sup>. In effect, I specialise in the creative use of applied econometric methods to inform health policy, to anticipate, and to effectively respond to real world challenges. In the last 3 years, my research has attracted external funding through several large grants from Rockwool Fonden (as collaborator) and from DFF (as PI).

**1. Excellence Objective:** As many workers struggle to manage an evolving work dynamic, employee mental health has become one of the biggest challenges for employers and policymakers. Poor mental health can negatively affect job performance and productivity, engagement with one's work, and daily functioning. While we know increases in import competition<sup>6</sup>, increases in sales<sup>7</sup>, adoption of performance-based pay<sup>8</sup>, and workforce reductions<sup>9</sup> all lead to worse employee mental health outcomes, to this date, there exists no comprehensive analysis of employee mental health outcomes that cuts across industry and occupation. In the next 3 years, my innovative project will undertake the first comprehensive evaluation of employee mental health in Denmark, by using econometric and machine learning techniques to leverage matched employer-employee longitudinal Danish register data linked to an extensive text analysis of company annual reports, stock market information, glassdoor ratings, accounting statistics, and the Danish Arbejdspladsvurdering (Workplace Assessment Surveys). This project involves 2 works packages (WP): WP1 - *Trends in employee mental health outcomes - An analysis of industry and occupation differentials.*; WP2 - *The causal effect of job security on employee mental health - Evidence from the Danish Flexicurity Model.* The new insights from this project will enable policymakers to identify jobs that are at a high risk of early exit and burnout, and the factors that are associated with this risk. Each WP will

---

<sup>1</sup>Revise & Resubmit at Review of Economics of the Household.

<sup>2</sup>Seetha Menon. "The effect of marital endowments on domestic violence in India". In: *Journal of Development Economics* 143 (2020), p. 102389.

<sup>3</sup>Adeline Delavande, Jinkook Lee, and Seetha Menon. "Eliciting survival expectations of the elderly in low-income countries: Evidence from India". In: *Demography* 54.2 (2017), pp. 673–699.

<sup>4</sup>Seetha Menon. *Unfinished Lives: The effect of domestic violence on neonatal and infant mortality*. Tech. rep. ISER Working Paper Series, 2014.

<sup>5</sup>Seetha Menon, Andrea Salvatori, and Wouter Zwysen. "The effect of computer use on work discretion and work intensity: evidence from Europe". In: *British Journal of Industrial Relations* 58.4 (2020), pp. 1004–1038.

<sup>6</sup>Italo Colantone, Rosario Crino, and Laura Ogliari. "Globalization and mental distress". In: *Journal of International Economics* 119 (2019), pp. 181–207.

<sup>7</sup>David L Hummels, Jakob Roland Munch, and Chong Xiang. "No pain, no gain: the effects of exports on effort, injury, and illness". In: *NBER working paper w22365* (2016).

<sup>8</sup>Michael S Dahl and Lamar Pierce. "Pay-for-performance and employee mental health: Large sample evidence using employee prescription drug usage". In: *Academy of Management Discoveries* 6.1 (2020), pp. 12–38.

<sup>9</sup>Arndt R Reichert and Harald Tauchmann. "Workforce reduction, subjective job insecurity, and mental health". In: *Journal of Economic Behavior & Organization* 133 (2017), pp. 187–212.

have a corresponding scientific article, to be published either in a Top-5 economics journal, and/or in top high-impact interdisciplinary journals such as PNAS or BMJ. This international and interdisciplinary project, with specialists in natural language processing, big data, accounting, and econometrics,<sup>10</sup> is the ideal cornerstone to fulfil **my excellence objective to secure funding through the Carlsberg Semper Ardens: Accelerator grant**<sup>11</sup> and/or under the health cluster of Horizon Europe Global Challenges.

## 2. Road map of activities by calendar year of for the years 2023 - 2025:

Year		2023				2024				2025			
Quarter		Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4
<b>Work Packages</b>	WP 1												
	WP 2												
<b>Conferences</b>	iHEA Biennial Congress												
	American Economic Association					✓				✓			
	European Economic Association							✓			✓		
<b>Research Visits</b>	Research visit at University of Lancaster			✓				✓					
<b>Scientific Training</b>	Machine Learning Methods						✓						
	Survival Analysis NetCourse	✓											
<b>Leadership Training</b>	Oxford Executive Leadership Programme		✓										
	CBS Research Management Course				✓								
	PRINCE2			✓									
<b>Research Assistance</b>	Text analysis of Annual Reports of Danish Companies					✓	✓			✓			
<b>Data Analysis</b>													
	<b>Working Paper</b>												
	<b>Dissemination</b>												
	<b>Revision</b>												
	<b>Submission</b>												

**3. Career Objective:** My integration at the Department of Economics and CPop, provides the ideal environment for the successful completion of this project, which is also poised to contribute to the Health and Inequalities cluster at SAMF. Given my strong publication record, and proven success in attracting external funding, I seek the support of the Talent Track program for: (i) Research leadership and project management training: In support of my excellence objective, I am keen to participate in the international research management course offered by Copenhagen Business School, specifically designed for non-Scandinavian research leaders working in Scandinavian countries, and the Oxford Executive Leadership Programme where I will acquire effective leadership skills. Furthermore, I will develop my management skills through the PRINCE2 certification, a scalable and flexible process based method for effective project management. (ii) Scientific training in advanced econometric techniques: To keep abreast of the economics data revolution, I will engage in two state-of-the-art advanced econometrics courses, in machine learning and survival analysis, to be used in this research project. (iii) Enhancing my national and international network: In support of research mobility, I have conducted research in the UK, Italy, US, and now in Denmark, which has facilitated a strong international network. I will strengthen my international profile even more so, through presentations at top health economics and general economics conferences and research visits at the Data Science Institute at The University of Lancaster, where cutting-edge data driven research in public health and health informatics is conducted. Together, these research and leadership competencies will enable me to reach **my career objective of becoming an internationally recognised academic leader in the field of health economics and qualifying for a full professorship at SDU.**

<sup>10</sup>My collaborators are Assoc. Prof. K Trottier, HEC Montreal, Assoc. Prof. V Athanasakou, Saint Mary's University, and Asst. Prof. M El-Haj, Lancaster University.

<sup>11</sup>Previously titled Carlsberg Young Researcher Grant

## Budget for the SAMF Talent Track

Research Activity	2023	2024	2025	Notes
<b>Financed by SAMF Talent Track</b>				
Data Access	30,000			<i>Purchase of the register datasets DRGPSYK_AMB, DRGPSYK_HEAL and PSYK_PERS and from Statistics Denmark</i>
Research Assistance		80,000	40,000	<i>Translation of danish terminology from the text analysis of company annual reports of companies listed in the Danish stock market for the last 15 years.</i>
Research Visit	25,000	25,000		<i>2 visits of 2 weeks each to the University of Lancaster in the first 2 years of the project - will cover transport and accommodation</i>
Scientific Training	2,000	14,000		<i>(i) Machine learning using python offered through the advanced study program of Kiel Institute for World Economy. (ii) Stata NetCourse lasting 6 weeks to effectively analyse survival data. Having already successfully completed two of Stata's programming NetCourses, this is the next step to up-skill these certifications.</i>
Leadership Training	20,100			<i>(i) Oxford Executive Leadership Programme to develop the skills to identify and articulate my leadership style and vision, and discover how to align this with SDU's strategic purpose. (ii) International Research Management Programme designed by Copenhagen Business School, specifically for non-Scandinavian research leaders working in Scandinavian countries addressing the principles of research management and leadership as well as the challenges met by international research managers working in Scandinavian research institutions.</i>
	36,000			
Project Management Training	10,000			<i>PRINCE2 uses a common language, systems and procedures and has become the de facto management standard in many organisations. Through this certification, I will be trained in how to control resources and risks which is invaluable to an international and interdisciplinary research agenda.</i>
<b>Co-Financed by the Department of Economics</b>				
Conference Presentations		18,000	18,000	<i>(i) 2 presentations at ASSA Annual Meetings in Winter of 2023 and 2024 (ii) 2 presentations at EEA congress in Fall of 2023 and 2024 (iii) 1 presentation at the binneal iHEA Congress in Summer of 2023, a specialist congress with several sessions focused on mental health that attracts the leading international experts in health economics</i>
		15,000	15,000	
		11,500		
<b>Total (DKK 77,500)</b>		<b>44,500</b>	<b>33,000</b>	