



The Boris Mints Institute
for Strategic Policy Solutions to Global Challenges
The Gershon H. Gordon Faculty of Social Sciences
Tel Aviv University

THE BORIS MINTS INSTITUTE

FOR STRATEGIC POLICY SOLUTIONS TO GLOBAL CHALLENGES

3rd Annual Report | **2018**



FOOD
SECURITY



RENEWABLE
ENERGY



CONFLICT
RESOLUTION

<http://www.bmiglobalsolutions.org/>



-  **Members of BMI's Advisory Board and Academic Committee:** Russia, Germany, Luxembourg, Armenia, Bulgaria, Czech Republic, Finland, Kenya, Montenegro
-  **BMI Research:** India, NEPAL, OECD, California
-  **BMI Conferences:** Finland, Malta, Georgia, Armenia

Table of Contents

Letter from the founder and President, Dr. Boris Mints	2
Letter from Head of BMI, Prof. Itai Sened	3
BMI Vision	4
BMI Structure	5
Steering Committee	5
International Academic Committee	6
International Advisory Board	7
Management	9
BMI's Operational Concept: Research Labs and International Co-operation	10
Research Grants and Support Scholarships	12
Food Security and Sustainable Development Lab	12
Water Lab	17
Class Structures, Poverty and and Inequality Lab	19
Conflict Resolution Lab	20
Renewable Energy Lab	22
Support Scholarships	24
BMI Prize 2018	25
BMI Conferences	26
Small Transition Economies: Tbilisi, Georgia and Yerevan, Armenia 11.09.2017–15.09.2017	26
BMI as a Global Player, Tel Aviv University, 02.05.2018–04.05.2018	27
BMI Activities	28
Cooperation with the Eilat-Eilot Renewable Energy Center	28
The Israeli Global Impact 2030, 31.10.17	28
Diaspora and Conflict Resolution Workshop, 17.5.18	29
The Future of Food: Where Science, Policy and Consumers Converge, 4.7.18	29
Visiting Scholars	30
Malta University Rector and Pro-rector – 16.11.17	30
Professor Anat Admati, Stanford University	30
Professor David Feldman, University of California, Irvine	31
Further Actions and Conferences	32

LETTER FROM THE FOUNDER AND PRESIDENT, DR. BORIS MINTS



From the moment BMI established, three years have passed. In these three years the Institute has expanded tremendously, the work has been showing outstanding results, and as BMI president, I am certain that our efforts are moving in a very positive path.

First, I would like to note the successfully conducted sessions of the Institute in Tbilisi and Yerevan, as well as Tel-Aviv, following which, the Institute started to proceed even more productively. I consider the main results of our work to be the research conducted in concrete projects in cooperation with the world's leading scientific centres and organizations, such as the ICIPE in Kenya, Tata Trusts in India and others. I believe that the realization of already existing projects and expansion of the cooperation is immensely important.

Secondly, I would like to point out the acceptance of Hon. Igor Luksic, the former Prime Minister, Minister of Finance and Minister of Foreign Affairs of Montenegro, to the advisory board, as he is a prominent professional who carries with a lot of experience, as well as a figure who can bring many crucial ideas to the discussion table. The next session of the Institute will be held in Igor's homeland.

During this year of activity, we have also awarded the BMI prize to an outstanding member of International Academia - Professor Michael Kremer from Harvard University, for his notable research and practice in the fields of inequality and poverty reduction.

From the future work of BMI, nothing less shall be expected than the sessions of the Institute conducted on the highest level with the participation of all members of the Advisory Board, prominent academia, practitioners and experts in global challenges of the modern world, as well as new projects and further international cooperation with world's leading institutions, whilst expanding the Institute in accordance with the BMI Operational Concept.

A handwritten signature in blue ink, appearing to read 'Boris Mints', with a stylized flourish at the end.

Dr. Boris Mints

Founder and President of the Boris Mints Institute for Strategic Policy Solutions to Global Challenges

LETTER FROM HEAD OF BMI, PROF. ITAI SENED



The Boris Mints Institute for Strategic Policy Solutions to Global Challenges was inaugurated three year ago thanks to the generous gift of Dr. Boris Mints. Since its inception, BMI had a significant impact on the lives of many and will continue to expand the reach and impact to many more. The key to this success is simple: We specialize in promoting research that matters!!!

We engage the best academics we can find in conversation with the most influential decision makers and members of diverse communities around the globe, to make sure we understand the pressing issues that preoccupy them. Deeply involved in research communities at Tel

Aviv University and worldwide, we apply the simple following rule: we support research that is cutting edge on the one hand and is imminently relevant to some major challenges that the diverse communities we engage with are facing. We support only research that matters and this is why our research matters. It is as simple as that!

After two years of establishing ourselves as a research institute, this year we have spread our wings to export and expand our research, knowledge and reach globally. On a project supported by the Matanel Foundation, we have sent our Ph.D. student, Opher Mendelson to work with a team at ICPIE in Nairobi Kenya, headed by our academic committee member Dr. Segenet Kelemu, to combat the spread of the fruit fly ravaging the Mango crops so critical to the local economy.

Dr. Fishman's Lab took upon itself to help the poorest farmers in India raise their standard of living through improving crop yield and return, using advanced technology and agro-economic tools developed in Israel. This project, supported by BMI, the Indian philanthropic organization TATA Trusts and the state Government of Andhra Pradesh is creating innovative programs, supporting the poorest farmers in the world. The initiative established an advanced R&D center and promote involvement of agricultural experts in villages and farms – so as to overcome technological, agronomic and economic barriers, to promote sustainable agriculture and food security

With the University of California, Irvine, we continue to develop our joint project on Water Management Challenges in Arid and Semi-Arid Regions, in cooperation with the Eilat-Eilat Renewable Energy Center. Our Founder and President, Dr. Boris Mints will be a guest of honor at this year's internationally renowned annual conference of the Eilat Eilat Center to celebrate his contribution to the research and development of this and other projects.

Our March meeting at Tbilisi and Yerevan, has significantly influenced our understanding and interest in the region. We are currently working on a large project to bring students from Central and East European universities to benefit from excellent degree programs at Tel Aviv University. Draft agreements are currently negotiated with LMSY and RAU and initial contacts to develop similar academic exchanges are underway with the Nazarbayev University of Kazakhstan and Mykolas Romeris University in Vilnius Lithuania. Our hope is to bring students from all over the world to partake in our diverse programs and projects while completing diverse degree programs offered at TAU.

As always, I conclude this letter with heartfelt thanks to Dr. Mints for his generous grant to establish the Institute, and all of the researchers that have responded to our calls for proposals. Those judged to have the merit to get support and their critically important research are reviewed in this report and our debt to them is simple to characterize: we only live by their success.

A handwritten signature in dark ink that reads "Itai Sened". The signature is written in a cursive, slightly slanted style.

Professor Itai Sened

Head of the Boris Mints Institute for Strategic Policy Solutions to Global Challenges
Founding Head, School of Social and Policy Studies, Tel Aviv University, Israel

BMI VISION

The Boris Mints Institute was founded with the intention to encourage research, planning and innovative thinking in order to promote a significant positive change in the world. BMI is focusing on designing strategic innovative plans to enhance the welfare of communities around the globe.

The world is thirsty for innovative, groundbreaking policy solutions to promote environmental sustainability, ensure food security, health and energy to all, and eradicate poverty. Yet, there is a dearth of applied, practical, policy-directed research on these issues. BMI addresses these challenges by operating on two levels: creating unique research grants and scholarships, as well as organizing disseminations and conferences focusing on contemporary global challenges.

BMI supports highly applied, practical and solutions-driven research, which is conducted by bright M.A and Ph.D. students under the supervision of internationally renowned senior scientists. The Institute will ensure that no good idea goes to waste due to lack of funding and bring Israel-developed technologies to the world's neediest populations – thereby enabling Israel to harness its renowned startup mentality in the service of humanity.

As a globally influential research institution, Tel Aviv University is committed to applying its know-how and experience toward solving real-world problems and is uniquely positioned to operate the proposed Institute.

BMI's DNA requires that its innovative ideas be transferred in real time to policy makers. BMI has already held several academic events and extended significant support for research projects in Food Security, Renewable Energy and Conflict Resolution.

➤ Steering Committee



Dr. Boris Mints, President

Ph.D. in Engineering. Previously the Chairman of Board of Directors of the "Otkrytie Stock Broker" OJSC. Co-Founder of "Otkrytie" Investment Group and Chairman of the Board. Founder of "01 Group". Chairman of the Board of Patrons of the Conference of European Rabbis. Awarded the Dashkova's Prize "Philanthropist of the Year" and Honorary Fellow of Tel-Aviv University.



Prof. Raanan Rein, Vice President of Tel-Aviv University

An Elias Sourasky Professor of Latin American and Spanish History, Vice President of Tel Aviv University and the Head of the S. Daniel Abraham Center for International and Regional Studies. Rein is the author and editor of more than thirty books and well over a hundred articles in academic journals and book chapters, in several languages. He is a member of Argentina's National Academy of History, and former President of the Latin American Jewish Studies Association (LAJSA). In 2016 he won the Reimar Lüst Award (co-sponsored by the Alexander von Humboldt Foundation and the Fritz Thyssen Foundation).



Prof. Tami Ronen-Rozenbaum, Dean of the Faculty of Social Sciences, Tel Aviv University

A researcher in the field of the Cognitive Behavioral approach and Positive Psychology, focuses on the function of self-control skills, positive emotions and social support as a way of overcoming distress and developing happiness. In her research, Prof. Ronen-Rozenbaum links a complex theoretical model of understanding human strengths and coping abilities to techniques for developing useful interventions in the field.



Mrs. Irina Buylova, Representative of BMI President

Executive director of Yegor Gaidar Foundation (Russia), a prominent journalist and internationally recognized expert in building effective interaction models for the Russian and international non-governmental organisations and educational, economics and social development institutions. In the 1990 – 2000s covered, as a journalist for the leading Russian media, social policy and development issues in the context of the turbulent Russian state economic and political transition.



Prof. Itai Sened, Head of BMI, Founding Head of the School of Social and Policy Studies, TAU

Prof. Sened is the Founding Head of TAU's new School of Social and Policy Studies at TAU's Gordon Faculty of Social Sciences. He recently returned to TAU after serving for 12 years as Director of the Institute for New Institutional Social Sciences at Washington University, US, established by economics' Nobel Laureate Douglass C. North.

➤ International Academic Committee



Prof. Yossi Rozenwaks, Dean of the Faculty of Engineering, TAU.

Research interests: Nanotechnology, Electrostatic force microscopy; Atomic force microscopy; Nanoscale charge injection in memory devices; Solar Cells; Organic semiconductor devices; Biological Field effect Transistors; Charge carrier dynamics in semiconductors and recombination processes.



Prof. Danny Chamovitz, Dean of the Faculty of Life Sciences, TAU.

Founder of the Manna Center Program for Food Safety and Security. Main research interests: Understanding the role of the COP9 signalosome (CSN) in regulating development and the role of anti-cancer chemicals found in plants in the plant's life. Recently appointed to the position of the President of the Ben Gurion University in Beer Seeba effective October 2018.



Prof. Miranda Schreurs, Professor of Environment and Climate Policy, Bavarian School of Public Policy, Technical University of Munich

Previously the Director of the Environmental Policy Research Center and Professor of Comparative Politics at the Freie Universität in Berlin and an Associate Professor in the Department of Government and Politics, University of Maryland. Schreurs' work focuses on comparative environmental politics and policy in Europe, the US, and East Asia. A member of the German Advisory Council on the Environment.



Dr. Segenet Kelemu, Director General of the International Center of Insect Physiology and Ecology (ICIPE) Nairobi, Kenya

Dr. Kelemu is the Director General of the International Center of Insect Physiology and Ecology (ICIPE) Nairobi, Kenya. Dr. Kelemu is a molecular plant pathologist with emphasis on elucidation of molecular determinants of host-pathogen interactions, development of novel plant disease control strategies including genetic engineering, biopesticides, pathogen population genetics and dynamics, endophytic microbes and their role in plant development. She has experienced the challenges and successes associated with African agriculture first-hand, from tending the field to directing world-class laboratories.



Prof. Itai Sened, Head of BMI, Founding Head of School of Social and Policy Studies at TAU

Research interests: Professor Sened specializes in the study of institutions and how they affect policy at all levels. Institutions may be formal institutions at the national or local level but can also be informal institutions such as social norms and cultural habits that may enhance or impede economic development and social prosperity.

➤ International Advisory Board



Mrs. Joelle Aflalo, Co-Founder of the Matanel Foundation

A founding member and the general-manager of Gestman SA, as well as a founding member of Cofidom-Gestman S.a.r.l., a regulated company established in Luxembourg and specialized in corporate structuring and investment engineering. In 2006, as an achievement of her constant need to be active in philanthropy for a better world and in line with her spirituality and her sense of responsibility, she founded together with Mr. Gad Boukobza, a charitable foundation named Matanel Foundation.



Prof. Armen Darbinyan, Chairman of the Board, Rector of the Russian–Armenian University, Yerevan, Armenia

An initiator of economic and political reforms in Armenia, including privatization, development of the private sector and the formation of governmental institutions. The author of national legislation regarding banking, stock companies, anti-trust and state regulation of public services, and others. The initiator and reformer of telecommunications, agriculture, infrastructure and tourism in Armenia. An international expert on economies in transition and awardee "Young Global Leader" of the World Economic Forum.



Dr. Simeon Djankov, Director, Financial Markets Group, London School of Economics

Declared "Bulgaria's Most Successful Politician" and awarded the President's Award of the World Bank. Visiting Professor, London School of Economics, Department of Finance. Previously a visiting Fellow in the Peterson Institute for International Economics, Washington DC. Former Deputy Prime Minister and Minister of Finance of the Republic of Bulgaria.



Dr. Sergei K. Dubinin, Chairman of Supervisory Council, Chairman of the Remuneration and HR Committee - VTB Bank

A Russian economist, former chairman of the Russian Central bank from 1995 to 1998, a professor of the Lomonosov Moscow State University, has been a part of the board of governors of many banks and financial institutions, as well as served a few positions in the government of Russian Government.



Prof. Jacob A. Frenkel, Chairman, TAU Board of Governors, former Governor of the Bank of Israel

Prof. Jacob A. Frenkel, Ph.D., serves as the Chairman of the TAU Board of Governors and as Chairman and Chief Executive Officer of the Group of Thirty. Dr. Frenkel serves as the President and Chairman of the Board of Council on Foreign Relations Inc. He served as the Governor of Bank of Israel since July 1, 2013 and previously from 1991 to 2000. From 2001 to 2011, he served as the Chairman and Chief Executive Officer of the G-30. He also served as the President at Merrill Lynch International.



Prof. Václav Klaus, Former President of the Czech Republic, Head of The Václav Klaus Institute

An academic economist by training, he was forced out of the Czechoslovak Academy of Sciences after the Soviet invasion in 1968 after the Prague Spring era. He returned after the so-called 'Velvet Revolution' of 1989, as one of the founders of the Civic Forum Movement. He was the country's first non-Communist Finance Minister and served from 1992 to 1997 as Prime Minister of the Czech Republic. In 2003 Klaus was elected President of the Czech Republic and reelected for a second term in 2008. Since 2012 the Head of The Václav Klaus Institute, which is a liberal-conservative think tank with its own research study activities, seminars and conferences. He is a member of the Mont Pelerin Society. He has published more than 30 books and received many doctorate degrees and international awards in various countries.



Dr. Igor Luksic, Former Prime Minister of Montenegro South East Europe Public Sector Director, PwC

Official candidate for the UN Secretary General 2016, Prime Minister 2010-2012, Deputy Prime Minister and Minister for Foreign Affairs and European Integration 2012-2016, Minister of Finance 2004-2010, Member of Parliament of Montenegro 2001-2003, Member of Parliament of Serbia and Montenegro 2003-2006. Presently, Luksic is with PwC as South East Europe public sector director Luksic holds PhD in the economics of transition and is an associate professor of the University of Donja Gorica Podgorica (UDG). Spending most of his professional career up to date in the public sector and serving in several governmental positions Committed to political and economic freedoms, Luksic advocated for transparency, put emphasis on dialogue and proactive approach both related to internal and foreign relations. While Prime Minister Montenegro opened accession talks with the EU and completed accession to WTO.



Prof. Itamar Rabinovich, Founder and President of the Israel Institute, Former Ambassador of Israel to USA and President Emeritus of Tel-Aviv University

Itamar Rabinovich, the president of the Israel Institute (Washington and Jerusalem), is Israel's former Ambassador to the United States, and the former president of Tel-Aviv University (1999-2007). He is Professor Emeritus of Middle Eastern History of Tel Aviv University, Distinguished Global Professor at NYU and a Distinguished Fellow at the Brookings Institution. Prof. Rabinovich has been a member of Tel Aviv University's faculty since 1971 and served as an Ettinger Professor of the Contemporary History of the Middle-East, Chairman of the Department of Middle Eastern Studies, Director of the Dayan Center for Middle Eastern and African Studies, Dean of Humanities and Rector.



Dr. Seppo Remes, Co-Founder and Chairman of the Board, EOS Russia

A Finnish citizen, has Licentiate of Economics degree from Turku School of Economics. Has worked in Russia from 1993-2015. Former CEO of the Investment Company "Vostok Energo" and Director of "Vostok Nafta", both investing in the Russian energy sector. Remes has been a board member of many Russian companies: He was elected as the Director of the Year in 2013 by Independent Directors' Association together with Russian Council of Industrialists and Entrepreneurs. In 2007 he founded, together with partners, the "EOS Russia" investment company which is listed at First North, Stockholm, and has chaired the Board of the company ever since. He is an Honorary Doctor from the Russian Plekhanov Academy of Economy, Moscow and Turku School of Economics, Finland.

➤ Management



Prof. Itai Sened, Head of BMI, Founding Chair, School of Social and Policy Studies at TAU

Founding Head of TAU's new School of Social and Policy Studies at the Gordon Faculty of Social Sciences. He recently returned to TAU after serving for four years as the Chair of the Department of Political Science and 12 years as Director of the Institute for New Institutional Social Sciences at Washington University, US, established by economics' Nobel Laureate Douglass C. North.



Dr. Alexander Pesov, Representative of BMI President

Dr. Pesov has a Ph.D. in Biology and is the author of several scientific publications. Dr. Pesov has previously worked as a journalist, writer and editor of several top soviet journals and newspapers and the vice-president of the International press-centre and club in Moscow. From 1998 till 2012 Dr. Pesov was an advisor to the prime-minister of the Russian Federation - Eugene Primakov, the chief of staff of the Ministry of Agriculture of the Russian Federation and Vice-Governor of the Voronezh region.



Dr. Haim Ben-Yaakov, Representative of TAU President

Ben-Yaakov is a Senior executive for regional Development and Public Affairs at Tel Aviv University. He served as CEO of the Euro-Asian Jewish Congress, Head of the Jewish Agency for Israel in Moscow and the Baltic States and as Educational Adviser for the Jewish Agency for Israel. Founded and Managed an Institute for Jewish Studies and Training Community Leaders.



Ayelet Fishman. Adv., Administrative Director of BMI

She received her LL.B. from the Hebrew University in Jerusalem and her M.A in Public Policy, with distinction from Tel-Aviv University. She formerly served as the National Supervisor of Elections at the Israeli Ministry of Interior.

BMI'S OPERATIONAL CONCEPT: RESEARCH LABS AND INTERNATIONAL CO-OPERATION

Rationale

As BMI enters its third year of activity, the time has come to suggest a more structured and focused mode of operation. The research seeds BMI has sown have already shown grew into several academic and policy publications. Our vision is to have a substantial contribution to both actual policy-making and publications in academic journals, important as they may be.

In order to use BMI resources more effectively and reach focused and meaningful progress in our research, BMI mode of operation will move **from sporadic annual research grants to long-term research labs**. Having reached the desired research quality and span, the new structure will make us even better at achieving our multiple goals. In addition to the research labs, BMI will continue its support scholarships program and award the annual BMI Prize.

Research Labs

BMI will operate through five research labs: (1) Renewable Energy; (2) Food Security and Sustainable Development; (3) Conflict Resolution; (4) Studies of Class Structures, Poverty and Inequality; (5) Water.

Each research lab will be comprised of a Lab Leader – a senior TAU faculty member who is an expert in the relevant field, and a group of MA and PhD students under his/her supervision. BMI labs will be the operative channel of co-operation with BMI's partners, both within TAU and international partners.

The operation of the research labs will be as follows:

1. BMI will select lab leaders according to their academic excellence and the relevance of their work to the BMI vision and foci of interest.
2. Research students for the labs will be suggested by the lab leaders and approved by BMI, in co-operation with the Deans of the relevant faculties.
3. The criteria for BMI support in research labs are as follows:
 - Academic excellence of the Lab Leader.
 - Relevance of the suggested study to BMI fields of research and its nature as an applicable research with global implementable outcomes.
 - Expected achievements of the research students.
4. Lab Leaders will submit an academic and financial progress report by the end of each academic semester. BMI may continue its support for each research lab based on its own evaluations of the lab progress reports and the research potential of each lab.

Support Scholarships

As of 2017, BMI extends support scholarship for potential social leaders within the school of Social and Policy Studies for substantial contribution to the community. The recipients of these scholarships are mainly Public Policy students. In 2017, BMI supported eight students who were carefully chosen according to their community leadership and social contribution.

BMI will continue its support for TAU students who show research and community leadership or take a part in our international research projects, according to the following procedure:*

1. BMI will issue an annual calls for support scholarships.
2. A scholarship committee will select recipients of the support scholarships. The committee members will be the Head of BMI and the Head of the School for Social and Policy Studies scholarship committee. A third, rotating member will be elected annually

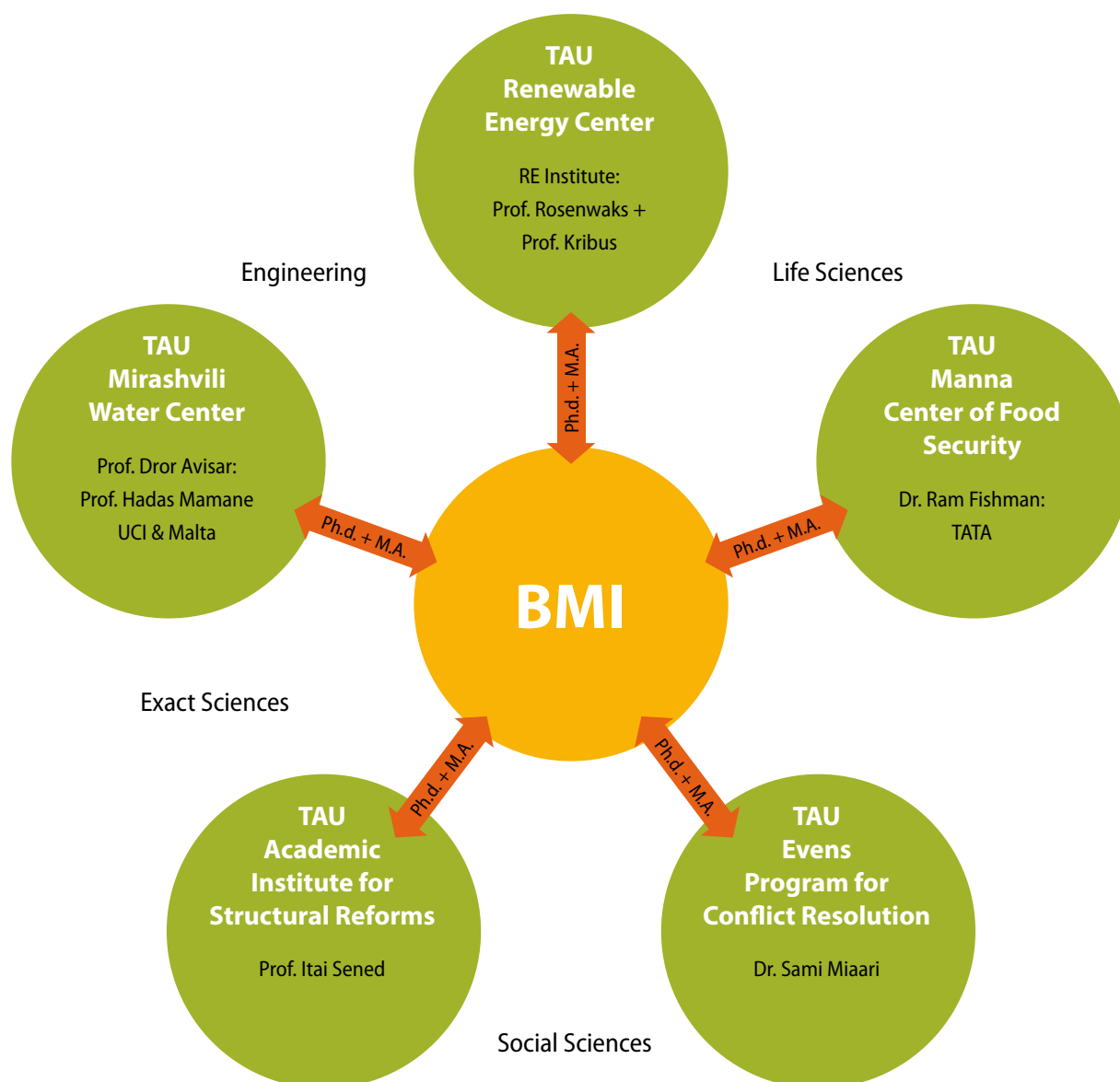
* The formal process and criteria are in accordance with the School of Social and Policy Studies' regulations.

3. The criteria for support scholarships are (one or more per student):

- The student has concluded the previous academic degree as an honour student.
- The student belongs to disadvantaged social groups in Israel: Arab, Ethiopian, Ultra-orthodox, Geographic and Social periphery, socio-economic difficulties.
- Academic excellence.
- Social involvement and contribution to the community.
- Involvement in BMI International research projects.

► BMI's Operational Concept of Research Labs and International Co-operation

The BMI Operational Concept focuses on five labs with international collaborations that spread around the world and across TAU faculties, and oversee different projects in various aspects of the most pressing global challenges. Below is the BMI Operational Concept Diagram:



➤ Food Security and Sustainable Development Lab



**Manna Center Program
for Food Safety & Security**
Tel Aviv University

In collaboration with the Manna Center Program for Food Safety and Security

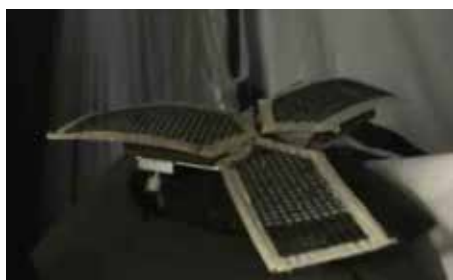


Lab Head: Dr. Ram Fishman, Department of Public Policy



Prof. Yossi Yovel, Faculty of Life Sciences and
Dr. Avital Bechar, Agricultural Engineering,
Volkani Institute

A drone-mounted sonar system for accurate yield estimation



As bats are able to navigate like no other animal can, using their technique of navigating can help develop robots, which will use sonar systems to accurately estimate yield of crops. Moreover, such robots, just as bats, would work better in groups and provide farmers with accurate information regarding the status of their crops. The aim of this project is to mount a sonar on a drone to allow quick, large and real yield assessments while flying above a field. The research team has achieved that goal, and developed a system that includes a gimbal that can be mounted on a drone and carry the sonar system – a combination of an emitter and an ultrasonic receiver. The system operated successfully in a pilot flight.

* For detailed presentations re our research projects, see: : <http://www.bmiglobalsolutions.org/single-post/2018/05/03/BMI-events-on-May-2018-BMI-as-a-Global-Player-1st-Day>

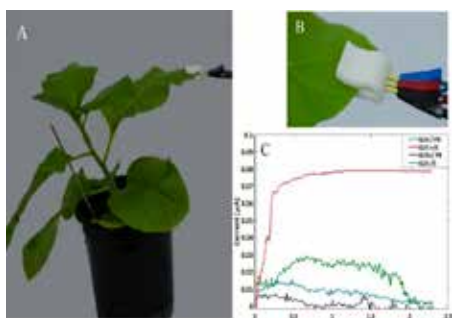


Figure 4 Measurements on *N. tabacum* plants over expression GUS. A, B) Electrode is connected to the leaves. C) Chronoamperometry at 700mV Vs Ag/AgCl of GUS positive plant (GUS+) with substrate PhG (GUS+S) and without substrate (GUS+PB), GUS negative plant (GUS-) with substrate PhG (GUS+S) and without substrate (GUS-PB).

Prof. Yosi Shacham-Diamand, School of Electrical Engineering, Department of Physical Electronics, Faculty of Engineering and

Prof. Adi Avni, School of Plant Sciences and Food Security, Faculty of life Sciences

Plant based heat stress whole-cell-bio-sensor (WCBS)

During the recent decades, water consumption worldwide has increased due to global warming, while precipitation in semi-arid and arid zones decreased. In the era where a dramatic increase in food supply is needed, managing irrigating carefully could lead to the reduction of growing costs. Monitoring heat stress will enable better watering management to obtain high yield with adequate quality. In the current study, the researchers used an electrochemical approach to assess the activity of β -glucuronidase (GUS) - first in the suspension cells of the transgenic tomato plant and then in a transgenic tobacco plant. GUS is an acid hydrolyase enzyme that cleaves a wide variety of β -glucuronic acids. It does not give a background signal in the plant. The researchers are currently developing a flexible electrode to measure GUS activity in Plants. To test the biosensor, the researchers generated transgenic cells and tobacco plants expression the GUS enzyme under the control of heat shock promoter. Using similar setting, they could measure GUS activity by the electrode only after heat shock. Currently, they continue to optimize the electrode and the interface with the plant.

Recent Publication of this research:

Richa Pandey, Orian Teig-Sussholz, Silvia Schuster, Adi Avni, Yosi Shacham-Diamanda, "Integrated Electrochemical Chip-On-Plant Functional Sensor for Monitoring Gene Expression Under Stress" Accepted for publication in the Journal of Biosensors and Bioelectronics, 2018.



BMI-TATA Project, by BMI fellows: David Shorman, Karel Finkelstein, Oren Kaplun, Shai Guilat, Alon Pardo

Academic Advisor: **Dr. Ram Fishman**, Department of Public Policy,
Faculty of Social Sciences

Indo-Israeli Innovation Villages

The cooperation between BMI and the Indian philanthropic organization TATA Trusts in this project is creating an innovative program, supporting the poorest farmers in the world. The initiative, sponsored by the state Government of Andhra Pradesh, is to establish an advanced R&D center and promote involvement of agricultural experts in villages and farms – so as to overcome technological, agronomic and economic barriers, imposed on local communities and promote sustainable agriculture and food security. The goals of this project are to double the farmers' income, focusing on the main challenges that Indian farmers are facing – water, diversification and soil health, as well as the high-value production of horticulture, dairy products and precise agriculture through irrigation. This program will systematically identify, adapt, test and diffuse modern agricultural technologies to smallholder farmers in India. The first step that the BMI-TATA team took is the development of a mobile phone-based app (see picture) for use by extension agents in order to collect data. This data will enable the researchers to define the nature of the major agricultural challenges and understand the working capacity of the farmers. The team will travel to India several times a year to collect data and continue the project. This project is now widely recognized, as the whole cooperation between TATA and Tel-Aviv University is channelled through BMI. In the future, we plan to extend the program to all parts of India.



BMI fellow Opher Mendelsohn

Academic Advisor: **Dr. Ram Fishman**, Department of Public Policy, Faculty of Social Sciences

Cooperation with ICIPE

Large Scale IPM of Oriental Fruit Fly in Kenyan Mango

BMI Food security and sustainable development lab is bringing agro-tech to the poorest corners of the world, to fight pests, mainly insects, that damage crops. BMI's cooperation with ICIPE, a prominent research institute in Kenya, sponsored by the Matanel foundation has launched a joint research project that focuses on combating the mango fruit fly. This co-operation promotes both low and high technology solutions, but stresses that these solutions must be accompanied by an adjustment or a change of practice. The project is implemented in different communities to find the best possible practice for protecting crops from insects and diseases. Integrated Pest Management (IPM) is a system that works better than pesticides. It is implemented technically environmentally and economically. Concerns over profit, risk (uncertainty), innovation acceptance, environment and health awareness as well as human pride challenge the adoption of the IPM. The project has several objectives: (1) Dissemination of a sustainable solution to the mango fruit fly in Elgeyo Marakwet county, Kenya; (2) Capacity building of the local extension service; (3) Increasing the regional cooperation and (4) Assessing the impact of adopting a new practice. In the long term this project seeks to develop R&D centres in the county levels as part of agricultural value chain, apply of development funds, improve farmers' cooperation. . This project doesn't only promote a change but actually digs in deep on how to help the farmers in Kenya and improve their life as a whole.

This project is funded by the Matanel Foundation



BMI fellow Yoav Rothler

Academic Advisor: **Dr. Ram Fishman**, Department of Public Policy, Faculty of Social Sciences

Can Economic Factors Mediate the Impact of Drought on Farmer Suicides in India?

In the academic year of 2017-18, Yoav has promoted his research in several ways. He has completed a research, which provides evidence of the strong causal impact that droughts have on farmer suicides in India, and shows that economic mechanisms related to agricultural income loss, such as irrigation and agricultural debt, are driving this association. Furthermore, Yoav had devised and headed the midline survey, in which he approached 1,800 farmers that participate in (or are in the vicinity of) the Ramthal Irrigation project in the state of Karnataka, India. The purpose of the midline survey is to provide first evidence on the short-term socio-economic effects of the adoption of drip irrigation by smallholder Indian farmers (following the baseline survey that was held in 2016-17). The survey is currently in the final phases of data collection, and we expect to complete the analysis of data and the drafting of the report in the next few months. Two academic papers associated with this research are currently under review.



Water Research Center
Tel Aviv University

In collaboration with the Water Center at TAU



Lab Heads: Prof. Dror Avisar, Head of TAU Water Center, Faculty of Exact Sciences, and **Prof. Hadas Mamane**, Head of the Environmental Engineering Program, Faculty of Engineering

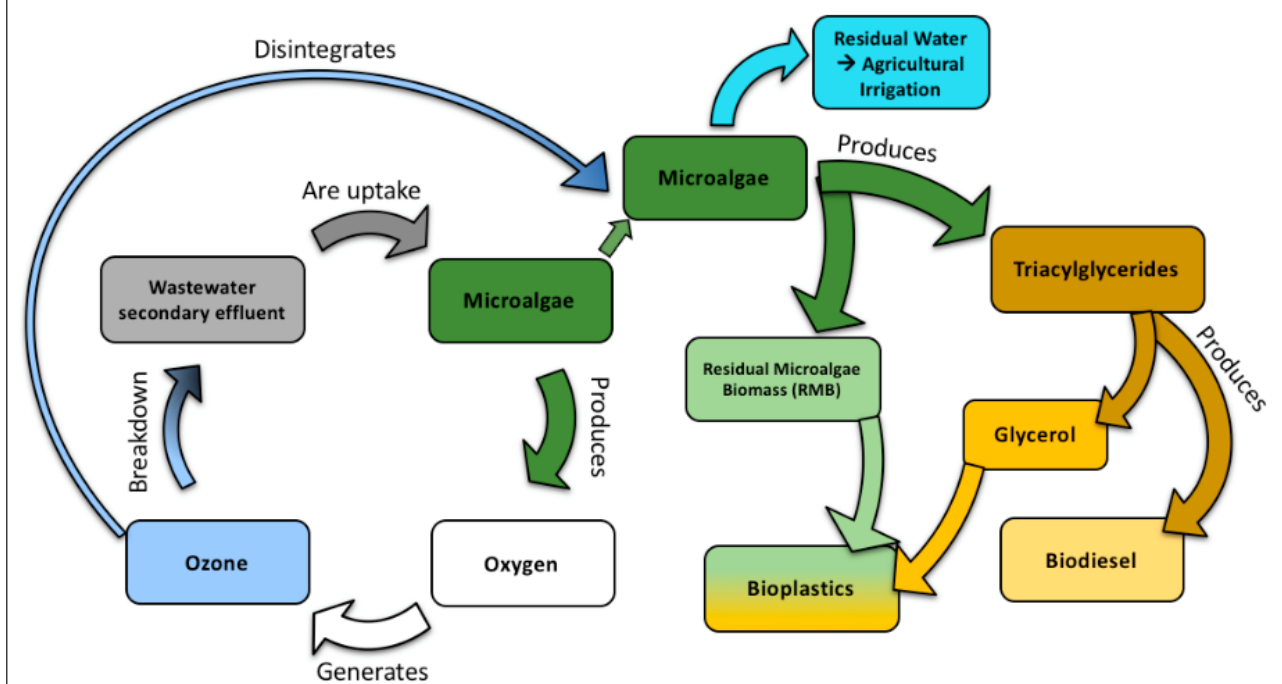


BMI Fellow Patricia Akao

Microalgae Utilization for Plasticizers Degradation, Biofuel and Plastic Production

The aim of this project is to create a solution for the problems of both renewable energy and freshwater, using a very simple biomaterial – algae. Patricia uses the circular economy concept, which promotes the production of efficient “green” biofuel and bioplastic. It is known that

Circular Economy Concept



plastic damages the environment and bio plastic is a practical way to decrease this damage. Natural biopolymers will create renewable biomass and degradable bioplastic will help preserve the world. Algae, in this sense, is a unique opportunity as it can absorb hazardous materials. Microalgae has a higher yield than other types of algae, therefore the productivity per space increases. In this project, algae is transformed into biodiesel and bioplastic through the following stages: Cultivation-Harvesting-Drying-Extraction-Transesterification. This process makes it rather expensive and therefore inefficient. However, if drying was taken out of the process, the price would decrease to reasonable levels, thus the suggestion is to use a wet route instead of drying in open pond or photo-bioreactors. The goal of this research is to design a prototype growth bioreactors, that are fed by either secondary wastewater or ozonised secondary wastewater, for efficient biodiesel and bioplastic production. By using this strategy we would enable the production of freshwater, as well as biodiesel and bioplastic, and contributing to the preservation of the environment. If the production costs were lowered through not using the drying stage, but rather using a wet route, it would be the most cost-efficient solution that is theoretically available up to date

➤ Class Structures, Poverty and Inequality Lab

In collaboration with the Academic Institute for Structural Reforms



Lab Headed by: Prof. Itai Sened, Head of BMI and the School of Social and Policy Studies

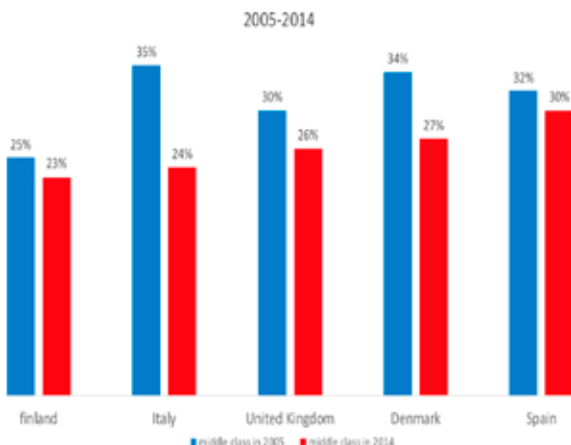
BMI Fellow Sagit Azari-Viesel

Academic Advisor: **Prof. Itai Sened**, Head of the School of Social and Policy Studies and Head of BMI

The middle class in OECD countries: between mobility and vulnerability

This research examines the size and condition of the middle class in OECD countries: between mobility and vulnerability. Sagit has made significant progress since first receiving BMI support two years ago and is about to complete her Ph.D. thesis in the 2018-19 academic year. The research describes and analyses the plight of the middle class in OECD countries for the past 10 years. The research examines several different countries, which vary from one another in its nature, history and socio-economic system. The research distinctly shows that in many countries, the middle class continues to go through a process of erosion (see diagram). This research establishes the origin and effect of the damage caused to the middle class by the transition from the previous welfare state structure of the economy, to the current, mega-corporation structure of the global economy. In order for the middle class to survive the socio-economic changes and for the lower class to move up the social ladder, they do not only need higher incomes but improved access to education, which leads to a higher-paying occupation, pension and capital values. Employment and shelter may be necessary conditions, but they are certainly not sufficient to maintain a person's membership in the middle class. In the past, the institutional structure of the welfare state played a critical role in defending the wellbeing of the middle class. Today, as the welfare state gave way to a neo-liberal regime in most of the OECD countries, institutionalized privileges and property rights needed to access education, pension, and housing will have to be restored and protected in order to bring this engine of economic growth – the middle class – to run again.

The middle class in selected OECD countries



➤ Conflict Resolution Lab

In collaboration with the Evens Program in Mediation and Conflict Management and the Academic Institute for Structural Reforms



Lab Head: Dr. Sami Miaari, Faculty of Social Sciences



BMI Fellow Karen Umansky

Academic Advisor: **Prof. Itai Sened**, Head of the School of Social and Policy Studies and Head of BMI

The Challenge of Radicalization of the Political Sphere in Contemporary Western Democracies

The political sphere in contemporary multi-party systems should be regarded as a multi-dimensional system, as shown in the diagram. The research examines diverse cases in many recent general elections through the prism of a “legitimate” enemy, according to which new radical parties not only address pervading public concerns and challenge incumbent political elites, but also shape voters’ identities by providing them with a sense of belonging to “us” as opposed to the “other”. The principal aim of the research is to understand the nature of the populist radical right and determine how and to what degree mainstream parties share their positions on economy and unemployment, government and politics, immigration and the EU. In the Austrian election of 2017 two traditionally polarized and ideologically diverse *Lagers* – the Social Democrats and the Conservatives – but also smaller parties of the opposition, such as the Liste Pilz and NEOS competed. Preliminary results indicate that the two parties with the highest election gains, OVP and FPÖ; share several key ideologies concerning the above-mentioned dimensions of immigration, economy, government and the EU.

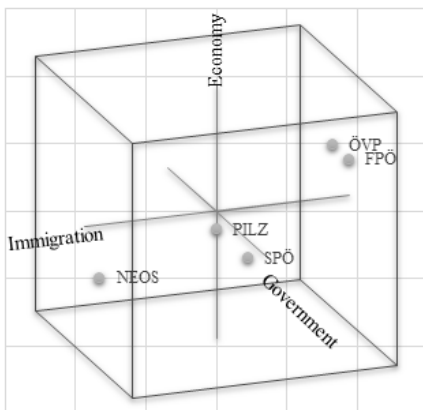


Diagram: Party positions on the issue of immigration in the 2017 Austrian Election, derived from election manifestos; Source Wahlkabine.

Recent Publication of this research:

Karen Umansky, Judith Kohlenberger, “Hunt of be hunted? Immigration as a “Legitimate” Enemy Strategy in the 2017 Austrian General Election” - Presented at the MPSA Annual Meeting in Chicago, 2018; will be shortly published at *The New European National Populism: Lessons for School Education*, by the PÄDAGOGISCHE HOCHSCHULE Salzburg Stefan Zweig, Austria.



BMI Fellow Amit Loewenthal

Academic Advisors: Dr. Sami Miaari and Prof. Itai Sened, Head of the School of Social and Policy Studies and Head of BMI

The Political Economy of the Israeli-Palestinian Conflict

This research provides insight into the role economic inequality plays in political conflicts. Many political conflicts, violent and non-violent, from the Arab Spring to Brexit, are attributed to economic grievance, a global phenomenon of political radicalization in an environment of rising intra-country inequality and economic resentment by people feeling left behind. Existing studies focus on cross-country analysis, and do not study the effect of economic inequality on political radicalization. We are the first to address these issues. We analyse the conflict-inequality nexus within the scope of a single political entity, using the Israeli-Palestinian conflict, one of the longest lasting political conflicts, as a case study of great significance. Using a unique combination of datasets on Palestinian socioeconomic condition and public opinion, the research explores the relationship between economic inequality and political conflict by examining two novel causes to Palestinian radicalization: wage inequality, and financial support by charitable organizations affiliated with political factions.

Recent Publication of this research:

Sami H. Miaari, Amit Loewenthal, "A Systematic Review of the Socio-Economic Effects of Exposure to Political Violence". *Handbook of Political Violence and Children: Psychosocial Effects, Intervention, and Prevention Policy*. Editors Charles W. Greenbaum, Muhammad M. Haj-Yahia, and Carolyn Hamilton. Oxford: Oxford University Press, forthcoming.

➤ Renewable Energy Lab



In collaboration with the Renewable Energy Center



Lab Heads: Prof. Yossi Rozenwaks, Dean of the Faculty of Engineering, and Professor Abraham Kribus, Faculty of Engineering

Continued support for Ph. D. Scholarships: Assaf Hochman, Porter School for Environmental Studies

Analysis of large-scale climate time-series and their downscaling over the Eastern Mediterranean

Hadar Traugott, Faculty of Engineering

Off-shore biorefinery for the biofuel production

Recent publications by the lab team:

Ph.D. Student Assaf Hochman:

1. Samuels R, **Hochman A (equally contributed)**, Baharad A, Givati A, Levi Y, Yosef Y, Saaroni H, Ziv B, Harpaz T, Alpert P. 2018. Evaluation and Projection of Extreme Precipitation Indices in the Eastern Mediterranean based on CMIP5 Multi Model Ensemble. *International Journal of Climatology*. DOI: 10.1002/joc.5334
2. **Hochman A**, Buccignani E, Gershtein G, Krichak SO, Alpert P, Levi Y, Yosef Y, Breitgand J, Mercogliano P. 2018. Evaluation of Regional COSMO-CLM Climate Simulations over the Eastern Mediterranean for the Period 1979 – 2011. *International Journal of Climatology* **38**: 1161-1176. DOI: 10.1002/joc.5232
3. **Hochman A**, Harpaz T, Saaroni H, Alpert P. 2018. Synoptic classification in 21st century CMIP5 predictions over the Eastern Mediterranean with focus on cyclones. *International Journal of Climatology* **38**: 1476-1483. DOI: 10.1002/joc.5260
4. **Hochman A**, Harpaz T, Saaroni H, Alpert P. 2018. The seasons' length in 21st century CMIP5 projections over the eastern Mediterranean. *International Journal of Climatology*, DOI: 10.1002/joc.5448
5. **Hochman A**, Mercogliano P, Alpert P, Saaroni H, Buccignani E. 2018. High-resolution projection of climate change and extremity over Israel using COSMO-CLM. *International Journal of Climatology* (in press).

BMI Fellow Gil Barnea*

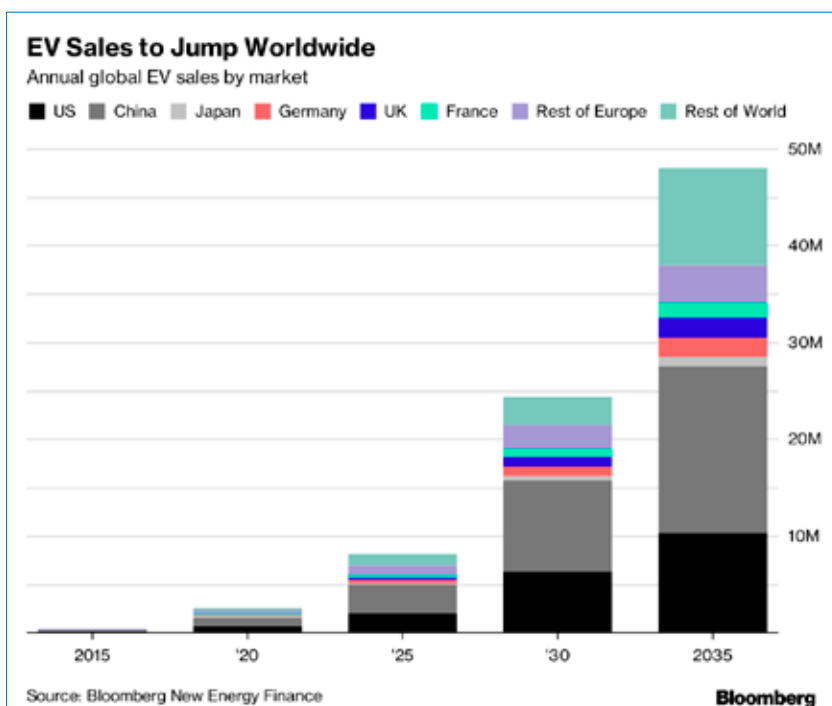
Academic Advisor: **Prof. Itai Sened**, Head of the School of Social and Policy Studies and Head of BMI

Emerging Technologies and the Transportation Sector Revolution

* Gil was the first laureate of the Smart Transport scholarship, awarded by the newly established Shmeltzer Institute for Smart Transport at the Faculty of Engineering.

In the modern era, new technologies are created on day-to-day basis and it is important to follow up on their rates of adoption in different countries. This research focuses on the transport sector, since an analysis of the global market of the adoption of new variations of transport is of immense importance. Electric and other alternative fuels, such as biofuel and fuel cells are rapidly taking over the market, giving signs towards a future end of the petrol era. The generally accepted understanding, based on the existing policy frameworks, indicates that the global transport sector must contribute about one-fifth of the total reduction of GHG emissions from energy use by 2050. We can assume that eventually, on a global scale, only one engine/fuel type will be able to fully emerge, due to global regulations and adoption around the world. Hybrids are being produced by many companies worldwide, and it seems as the future of the vehicles is right around the corner. Nonetheless, even one of the most efficient technologies currently available - electric vehicles, still has an issue, as it requires charging points to be present in many various locations, which would be problematic to provide, especially since the government is not active in promoting new vehicle types. The main question the world is facing, as the revolution of the sector is already inevitable, is which one of the technologies will be accepted so

widely, that it would outcompete every other invention presented. Norway is currently the leading country in the world in either electric or hybrid cars, Europe can be dominant in the new emerging market, as other countries like Germany are starting to wake up on this phenomenon, yet China and Japan are making huge efforts towards being big in the market too. The EU must develop the industry in the market, in order to allow the transition towards new vehicles to come to mass consumption. The future will rely on alternatively fuelled vehicles and this analysis shows how.



SUPPORT SCHOLARSHIPS

Partners: Mrs. Lili Segal, the “Rakia” program and the “Nirim” N.G.O

As of 2017, BMI extends support scholarship for social leadership and a substantial contribution to the community. The recipients of these scholarships are mainly Public Policy students, and on 2018, BMI has increased its support program and supported 11 Ph.D. and M.A. students who were carefully chosen according to their academic excellence, community leadership and social contribution. The scholarships were awarded as a part of an academic seminar on January 19th, 2018, with Dr, Avihai Mandelblit, Israel's Attorney General, as the keynote speaker.



From left to Right: Prof. Itai Sened, Head of BMI; Former Justice Avi Zamir and Dr. Avuhai Mandelblit, Chief Legal Adviser to the Government of Israel handing out the BMI certificates for special scholarship support at the annual event in memory of the renowned legal scholar, Professor Zeev Segal, former distinguished member of the faculty of the School of Social and Policy Studies in the Department of Public Policy.

Starting in 2017, every year during the BMI Session held in May at Tel-Aviv University, BMI awards a prize of \$100000 to a prominent member of global academia for their outstanding work in one of the fields that BMI operates in, specifically dedicating their academic life towards solving a strategic global challenge. Last year, the recipient of the prize was Professor Jeffry Sachs of Columbia University. The members of the 2018 evaluation committee were three internationally renowned scholars: **Professor Anat Admati**, George G.C. Parker Professor of Finance and Economics, Graduate School of Business, Stanford University; **Professor David Feldman**, Chair – Department of Planning, Policy and Design, School of Social Ecology, University of California, Irvine; and **Professor Janice Stein**, Belzberg Professor of Conflict Management, Department of Political Science, University of Toronto. The Evaluation Committee has decided to award the BMI Prize to

Michael Kremer, Gates Professor of Developing Societies, Department of Economics, Harvard University

Professor Michael Kremer is a Fellow of the American Academy of Arts and Sciences, a MacArthur Fellowship recipient, a Presidential Faculty Fellowship recipient, he was named a Young Global Leader by the World Economic Forum, and he was named as one of Scientific American's 50 researchers of the year. Professor Kremer's recent research examines the causes and consequences of poverty and global inequality. Within this area of research, he has focused on important factors such as education, health, water, and agriculture.

He has had an outstanding research record on issues related to poverty reduction, inequality and public health policy in a global context. The volume and quality of his academic work with respect to "advanced market commitments" is among the strongest international set of scholarly contributions of any scholar in this field. His research seeks to find practical solutions to public health problems in developing countries. Professor Kremer's research has increased our understanding of global poverty in many different ways. The impact of his work on public action and on transforming local and especially global policy has been especially high, particularly in the field of public health policy. His scholarship has directly influenced a consortium of governments and foundations to develop vaccines for tropical diseases, including pneumococcal diseases – a program that has spread to nearly 60 countries. He has also served as the science director of development innovations for the U.S. Agency for International Development; has served as a Brookings Institution fellow. He is the co-founder of "World Teach" – a Harvard based initiative that places students and recent alumni in teaching positions in developing countries.

Prof. Kremer is the 2018 BMI Prize laureate due to his outstanding scholarly accomplishments, as well as his significant contribution to policy making in the fields of global development, and in particular on the struggle to address inequality, poverty and food security - themes that are at the heart of the Boris Mints Institute's vision and mission. In awarding the prize to Professor Kremer we emphasize BMI's global thinking and commitment to the most pressing problems of our time.



Professor Kremer receives the prize from Professor Itai Sened, Dr. Boris Mints and Professor Joseph Klafter, TAU President



For Prof. Kremer's lecture at the BMI Conference:
<https://www.youtube.com/watch?v=v-cQDKxnymc>

The annual international gatherings of BMI focus on pressing world policy challenges, inviting a handful of leaders to join a small and carefully selected circle of members of the international board of BMI and a handful of outstanding scientists on the topic of the day. In these exclusive meetings, the global challenges are discussed in depth and new ideas are encouraged and carefully assessed.

The presentations and photos of our events are available on our website: <http://www.bmiglobalsolutions.org/>

➤ Small Transition Economies: Tbilisi, Georgia and Yerevan, Armenia 11.09.2017–15.09.2017

In September 2017, BMI held its third international conference in Georgia and Armenia, inviting the members of the International Advisory Board to meet local dignitaries and decision-makers, as well as academic expert, for a 4-day discussion of the question, which faced both of the hosting countries: “How to facilitate a smooth social and economic transition?” We were honoured to host in this conference, among others: **Professor James Wertsch**, David R. Francis Distinguished Professor, Vice Chancellor for International Relations, Director, McDonnell International Scholars Academy Professor of Socio-cultural Anthropology and the Program on International and Area Studies; **Mr. Karen Karapetyan**, Prime-Minister of Armenia; **Prof. Hrant Bagratyan**, Former Prime-Minister of Armenia; **Mr. Giorgi Kvirikashvili**, Prime Minister of Georgia and **Mr. Igor Luksic**, former Prime Minister, Montenegro (who joined the BMI Board on May 2018). The Armenian part of the conference took place at the Russian Armenian University in Yerevan, with the kind hospitality of Professor Armen Darbinian, Rector of the university and a member of the BMI Board. BMI Board members also had a meeting with Hon. Mr. Serzh Sargsyan, President of Armenia.

During the conference, the speakers presented the different practical paths taken by Georgia and Armenia since the disintegration of the Soviet Union until now, as well as the academic conclusions that can be drawn from the processes that took place in both countries, also suggesting directions for the future. The participants concluded that there is hardly one universal recipe of economic transition success and agreed that political institutions and leadership play a critical role in the process. Successful transitions depend on hardworking, stable, well-educated and highly-trained middle class. An additional lesson is that economic and demographic statistical data provide only one prism of the story. The structure of society, national beliefs and cultural heritage must also be taken into account. Sociocultural determinants are fundamental factors of economic success or the development of strategies to achieve it.

For the summarizing report of the conference go to:

http://docs.wixstatic.com/ugd/2ea2a4_817a4a548efb46d988aaa9121fed14d3.pdf



Members of the International Advisory Board of BMI attending the Small Transition Economies conference at Tbilisi, Georgia



Dr. Boris Mints and Natalia Borovnik attending the Small Transition Economies conference at Yerevan during the Armenian part of the conference

➤ BMI as a Global Player, Tel Aviv University, 02.05.2018–04.05.2018

As a part of the Annual Assembly of TAU Board of Governors, BMI held its annual gathering, reviewing the progress in the various research projects we support, honoring our international partners and focusing on BMI's role as a prominent global player. During the session, BMI Advisory Board members discussed the BMI research projects, which were presented by BMI fellows, and set the guidelines for BMI's future actions. We were honoured to host several internationally renowned guest speakers, such as BMI Prize laureate Professor Michael Kremer of Harvard University, Professor Anat Admati of Stanford University and Professor David Feldman of University of California, Irvine. As an introduction to our cooperation with Malta, Dr. Paula Grec-Bonnici, Executive Director for Compliance and Quality in the Maltese Water Services Corporation, presented the extensive work done by her organization. The purpose of the conference as a whole was to introduce the cooperation between BMI and our various partners – both international partners and partners within TAU.

For the summarizing report of the conference: <http://www.bmiglobalsolutions.org/>



BMI Board discussing research projects



TAU President Prof. Klafter and BMI President and Fonder Dr. Mints

➤ Cooperation with the Eilat-Eilot Renewable Energy Center:



Eilat-Eilot Renewable Energy Center, Arava Seminars

During the past year, BMI has continued the cooperation with the Eilat-Eilot Renewable Energy Center, strengthening the partnership even further. We held two academic seminars, bringing together student from several faculties across TAU, as well as from the Afeka College for Engineering. These seminars enabled the students to get an inter-disciplinary view of the subjects, learn from the best academic experts and practitioners, and gain priceless practical experience.



1. Sustainable Development, led by **Dr. Ram Fishman**, October 15th-19th, 2017.



2. Renewable Energy, led by **Prof. Itai Sened**, Head of BMI, January 28th–February 1st, 2018.

➤ The Israeli Global Impact 2030, 31.10.17

BMI hosted the opening session for a strategic cooperation process between all the relevant Israeli governmental and non-governmental bodies and agencies who are engaged in various aid projects around the world. The meeting was aimed at enhancing the impact of Israel's work in the developing world, in accordance with BMI vision of dealing with global challenges. The SDSN initiative, headed by the laureate of the 2017 BMI Prize, Professor Jeffrey Sachs, was the co-sponsor of this meeting.

➤ Diaspora and Conflict Resolution Workshop, 17.5.18

This international workshop discussed the way in which conflicting groups coexist peacefully in the diaspora, and the influence these relations have on the conflict back home. The workshop hosted four leading European scholars specializing in the topic, and explored concrete research directions with Israeli colleagues. The guest scholars were Prof. Thomas Morton, Exeter University; Prof. Rhiannon Turner, Queen's University, Belfast; Prof. Clifford Stevenson, Nottingham Trent University and Dr. Masi Noor, Keele University.

For videos of the lectures: <https://youtu.be/fxsmkKvsgEs>; <https://youtu.be/mXp-Sl2EL3k>; <https://youtu.be/xVD6nc2012g>; https://youtu.be/ut_BXNDh_rc; https://youtu.be/5A2_s9zfEhw; <https://youtu.be/WgM765UsdU4>; <https://youtu.be/no6y88uC0oQ>

➤ The Future of Food: Where Science, Policy and Consumers Converge, 4.7.18

As a part of our cooperation with the Manna Center Program for Food Safety and Security, BMI hosted a daylong conference, dealing with the various aspects of food security: food choices in a world of plenty, genetic engineering of plants and the need to tailor global innovations into local solution for the developing world. 170 participants attended the conference, many of which students from developing countries. We were also fortunate to host three leading figures in the field and learn from their extensive experience: Prof. Jan Low, International Potato Center (CIP), Kenya, Laureate of the 2016 World Food Prize; Prof. Kevin Folta, Department of Horticultural Sciences, University of Florida and Prof. David Just, Charles H. Dyson School of Applied Economics and Management, Cornell University.

For videos of the lectures: <https://www.youtube.com/user/TAUVOD/videos>

Professor Itai Sened, Head of BMI, has represented the Institute in two major international conferences: the Yegor T. Gaidar Institute for Economic Policy Conference in, Moscow on November 2017 and the International Economic Forum in Saint Petersburg on May 2018. Economy of the future: the role of state and business.

Prof. Sened also attended the fourth Matanel gathering in Israel on June 2018.



Prof. Joseph Steinman, Chairman of the Olivestoinstone Foundation, Ms. Joelle Aflalo, Co-President of the Matanel Foundation and Prof. Itai Sened, Head of BMI



Prof. Sened at the Emertech 2017 Conference in Moscow



The International Economic Forum: Prof Sened, Prof. Vladimir Mau, Rector of RANPA University; Prof. Kropachev, Rector of Saint Petersburg University

Malta University Rector and Pro-rector – 16.11.17



BMI hosted two leading academics from Malta University: Prof. Alfred Vella, Malta University Rector, and Prof. Saviour Zammit, Pro- Rector for Research and Knowledge Transfer, to discuss the scientific cooperation between BMI and Malta University on the topics of land degradation and water. Our guests met TAU President, Prof. Klafter, as well as BMI researchers.

Professor Anat Admati

George G.C. Parker Professor of Finance and Economics, Graduate School of Business, Stanford University – May 2018



Prof. Admati, the chairperson of the 2018 BMI Prize Evaluation Committee, was the keynote speaker at the BMI Conference on May 2018. Prof. Admati discussed the connection between the problematic banking and corporate governance structures and local, national and global inequality. The banking system is very inefficient, dangerous and privileged. Lack of transparency and the excess of inconsistency were the factors that truly caused the 2007-8 crisis. Prof. Admati contended that we are still hostages to the big banks, as no one has the courage to act. Banks get away with inefficient investments and recklessness with no personal accountability

for those involved. Something that can be viewed both as the cause and as the result of the failure of banking is the way corporate governance functions and policies fail. Alignment of managers with shareholders is the challenge in corporate governance, as the single consumer suffers from a general lack of knowledge. A significant challenge facing the system of modern banking and governance and caused by it, is inequality. For further development of the solution to this global challenge we need extensive socioeconomic research and the development of a whole new global framework for government policy, which will help establish a transparent, legally just model of banking and governance, so that the financial system start working for all parties, consumers included.

For Prof. Admati's lecture at the BMI Conference: <https://www.youtube.com/watch?v=3yJBf8ZOVY4>



Professor David Feldman

Chair – Department of Planning, Policy and Design, School of Social Ecology, University of California, Irvine – April-May 2018

Prof. Feldman, a member of the 2018 BMI Prize Evaluation Committee, spent 3 weeks at TAU. During that time, Prof. Feldman has taught as a guest scholar in several courses, visited the Eilat-Eilot Renewable Energy Center in the Arava and took part in the BMI events on May 2018. Prof. Feldman's main lecture focused on the scarcity of freshwater in the world and the ways to approach this challenge. BMI has

collaborated with UCI for two workshops, led by Prof. Sened and Prof. Feldman, in order to try targeting this global challenge according to the experience of both California and Israel, two similar locations in their climate and freshwater resources; however, places that promote two very different policies.



FURTHER ACTIONS AND CONFERENCES

At BMI, we are constantly looking for ways for expanding our activity range and enhancing the institute's global influence. As well as continuing the research in our research labs, together with our local and international partners, here is a taste of expected activities planned for BMI's fourth year of activity:

- A conference in Montenegro on October 2018, focusing on the emerging and fast spreading technology of blockchain: "Blockchain – The new Architecture of the World", putting together academics, decision makers and technology entrepreneurs and discussing the current and future influence of the blockchain technology on people, institutions and society as a whole.
- A conference in London on March 2019: "A New Era in Economics and Policy" – discussing new economic concepts, and how they would change the world.
- Opening our Arava seminars to international students, in cooperation with several universities around the world.

We believe that we can truly make a difference to the world and help solve global challenges through encouraging and supporting promising students and prominent academia, conducting research in various areas and implementing international projects that will make a change for the better. Alongside the research effort, we aim to expand the distribution of our reports and policy recommendations, in order to reach decision makers and achieve an impact on actual policy- making.



Members of BMI's Advisory Board and Academic Committee: Russia, Germany, Luxembourg, Armenia, Bulgaria, Czech Republic, Finland, Kenya Montenegro



BMI Research: India, NEPAL, OECD, California



BMI Conferences: Finland, Malta, Georgia, Armenia



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