

Industry/Sector Experience

- Digital and financial transformation of a SME through ERP optimization, intelligent document management, and AI integration to improve efficiency, transparency, and strategic decision-making
- Integrated assessment modelling to help clients understand the physical and transition risks that they will face under various climate change scenarios, and the strategy they need to put in place to mitigate these risks as well as to take advantage of any opportunities arising.
- Development and simulation of coherent sectoral and regional scenarios of the long-term trends of the Swiss economy up to 2060 that will be used in the Swiss Transport Outlook 2050 and the Energy Outlook 2060 produced by the Swiss Government.
- Economic impact assessment of redeveloping three urban areas in the centre of Geneva for residential and commercial uses model based on an in-house multi-regional input-output model of the Swiss economy.
- Development of city statistical indicators for the Royal Commission in Jubail, Saudi Arabia.
- Economic impact assessment at the regional level in Australia of a broad range of infrastructure and other investment or development projects.
- Review of peer reports based on national and global CGE models dealing with energy policy and trade policy.
- Economic impact assessment of systemic risks on large multinational corporations based on a dynamic MRIO CGE model of the world economy with sector-specific investment behaviour.
- Trade policy analysis with particular emphasis on non-tariff barriers issues based on a dynamic MRIO CGE model of the world economy with detailed international supply chains linkages.
- Economic analysis on the convergence of Asian regulatory schemes in the investment management industry
- Development of modelling capability in relation to economic assessment of recovering water for the environment on local communities in the Murray-Darling Basin.
- Analysis of tax policy regime options in Dubai to advise the client on comparative merits of tax policy options.
- Economic impact assessment of energy- and transportation-related infrastructure development and operation in The Bahamas and in Australia based on regional CGE modelling.
- Impact analysis of the real property tax in The Bahamas and of the mineral exploration tax credit in Australia.
- Assessment of transposing to Australian Defence Force publicly available methodologies on the modelling of future climate impacts and on the quantification of vulnerability and severity of risks.
- Senior economist and CGE leader for the Economic of Adaptation to Climate Change study at the World Bank.
- World Bank missions to developing countries to establish relationships with Governments.

Selected Publications

- [Scénarios par branche et leur régionalisation – Actualisation 2025](#) (with A. Müller). Report commissioned by the Swiss Federal Office for Spatial Development and the Swiss Federal Office of Energy. Berne: Switzerland, 2025.
- [Differentiated Carbon Pricing to 2050: Insights from KPMG-IAM](#) (J. Schneider, A. Calzadilla and D. Birur). Paper prepared for presentation at the 26th Annual Conference on Global Economic Analysis, Bordeaux, 2023.
- [Scénarios par branche et leur régionalisation](#) (with A. Müller). Report commissioned by the Swiss Federal Office for Spatial Development, the Swiss Federal Office of Energy, and the Swiss State Secretariat for Economic Affairs. Berne: Switzerland, 2020.
- Economic Consequences of Trump's Proposed Policies. Paper presented at the 20th Annual Conference on Global Economic Analysis, West Lafayette IN, 2017.
- Convergence of Regulatory Schemes in the Investment Management Industry. Paper presented at the 19th Annual Conference on Global Economic Analysis, Washington DC, 2016.
- Dynamic Global CGE Model with a GVAR-based Baseline. Paper presented at the 18th Annual Conference on Global Economic Analysis, Melbourne, 2015.
- Sector-Specific Investment in a MRIO CGE Model. Paper presented at the 17th Annual Conference on Global Economic Analysis, Dakar, 2014.
- A note on climate change adaptation for seaports: a challenge for global ports, a challenge for global society (with A. Becker et al.). Climatic Change, 120(4). October 2013.
- Ports in Developing Countries: Lessons from the World Bank Economics of Adaptation to Climate Change Study. Presentation at the UNCTAD Ad Hoc Expert Meeting, Geneva, 2011.

- Sectoral Forecasting 2006 to 2030 in the Swiss Economy Using the SwissAGE Model. Berne, Switzerland: Federal Chancellery, 2011.
- Growth and Structural Change in the Swiss Economy from 2001 to 2008 using the SwissAGE Model. Berne, Switzerland: Federal Chancellery, 2011.
- Adaptation to Climate Change Vulnerability Assessment and Economic Aspects, Plurinational State of Bolivia (with The World Bank). Washington DC, USA: The World Bank Group, 2010.
- Economics of Adaptation to Climate Change, Vietnam (with The World Bank). Washington DC, USA: The World Bank Group, 2010.
- [Economics of Adaptation to Climate Change, Samoa](#) (with The World Bank). Washington DC, USA: The World Bank Group, 2010.
- [The Cost to Developing Countries of adapting to Climate Change – New Methods and Estimates](#) (with The World Bank). Washington DC, USA: The World Bank Group, 2010.
- An Optimal Growth Model for Climate Resilient Investment Planning (with E. Kalvelagen). Background paper to the Samoa country case study on the Economics of Adaptation to Climate Change, Washington DC, USA: The World Bank Group, 2010.
- Assessing the Cost of Adaptation at the Country Level (with R. Schneider). Background paper to the Bolivia country case study on the Economics of Adaptation to Climate Change, Washington DC, USA: The World Bank Group, 2009.
- The Economics of Adaptation to Climate Change - A Bottom-Up and Top-Down Integrated Assessment Framework. Paper presented at the 12th Annual Conference on Global Economic Analysis, Santiago, 2009.
- [The Swiss Model of World Production, Consumption and Trade](#) (with A. Müller and R. van Nieuwkoop). Berne, Switzerland: Federal Chancellery, 2007.
- Economic Impacts on Switzerland of Agricultural Trade Liberalization. Confidential Report. Berne, Switzerland: State Secretariat for Economic Affairs, 2007.
- The Swiss Railway Investment Fund (with Urs Springer and Stefan Suter). In A. de Palma, R. Lindsey, and S. Proost (Eds.), Investment and the use of Tax and Toll Revenues in the Transport Sector. Oxford, UK: Elsevier Ltd, 2007.
- The socio-economic impacts of transport pricing reforms (with Stef Proost et al.). EU Sixth Framework Programme. ITS, University of Leeds, 2007.
- Liberalizing Services in Switzerland and with the European Union (with A. Müller). In Strukturberichterstattung Nr. 33E. Berne, Switzerland: State Secretariat for Economic Affairs, 2005.
- Strukturwandel - Ursachen, Wirkungen und Entwicklungen (with A. Müller and R. Oleschak). Strukturberichterstattung Nr. 29. Berne, Switzerland: State Secretariat for Economic Affairs, 2005.
- Agricultural Policy and Consumer Welfare (with A. Mattei). Working paper 03.11, Department of Economics, University of Lausanne, 2003.
- The Reform of the Swiss Agricultural Policy: An Approach Through the Multifunctionality of Agriculture in a CGE Framework. Ph.D. Thesis, Department of Economics, University of Lausanne, 2001.

CGE Modelling

- KPMG-IAM – A 141-region, 76-sector, recursive-dynamic CGE Model of the World Economy with a detailed treatment of energy and power sectors and linked to the MAGICC model (GEMPACK/GAMS)
- SwissREG – A Single-country multi-regional recursive-dynamic CGE Model for Historical/Decomposition and Forecast/Policy Analysis in Switzerland (GEMPACK/GAMS)
- DGEM – A 140-region, 57-sector, dynamic CGE Model of the World Economy with detailed international supply chains linkages and sector-specific investment behaviour (GEMPACK/GAMS)
- Dubai-Tax – A Three-regions Static CGE Model of the World Economy for Tax Policy Analysis in Dubai (GEMPACK)
- K-CORE – A Single-country Recursive-Dynamic CGE Model for Australia (GEMPACK)
- GB-TAX – A Single-country Recursive-Dynamic CGE Model for Tax Policy Analysis in The Bahamas (GEMPACK)
- SwissAGE – A Single-country Recursive-Dynamic CGE Model for Historical/Decomposition and Forecast/Policy Analysis in Switzerland (GEMPACK/GAMS)
- OGM-CRIP – A Single-country Intertemporal Macro Model for Climate Resilient Investment Planning applied to Samoa (GAMS)
- IFPRI-EG – A Single-country Recursive-Dynamic CGE Model for Energy Policy Analysis in Uganda (GAMS)
- SwissGEN – A World Intertemporal CGE Model for Policy Analysis (GAMS)
- SwissTRANS – A Single-country Intertemporal CGE Model for Swiss Transport Policy Analysis (GAMS)
- SwissAG – A Multi-countries CGE Model for Swiss Agricultural Policy Analysis (GAMS)
- SwissSER – A Multi-countries CGE Model for Services Liberalization Analysis (GAMS)