Curriculum Vitae

Vladimir M. Veliov

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Current position and activities:
Univ. Prof. i.R., and Res. Assoc. at Vienna University of Technology
Leader of a project of the Austrian Science Foundation (till 07.2024)
Consultant, Joint Research Center, EU Commission, Ispra, Italy (since 2021)
Member of the Board of Experts of the German consortium HIRGEV: "Hitzeresiliente Gesundheits-versorgung" (2024--27)

Previous positions:
2008-2021: Full Professor, Vienna University of Technology
2017-2021: Head of Institute of Statistics and Mathematical Methods in Economics
2008-2021: Head of Research Unit “Operations Research and Control Systems”
2000-2008: Research assistant/senior researcher at the Vienna University of Technology
1988-1993: Research Scholar and Acting Project Leader at the International Institute for Applied Systems Analysis (IIASA), Laxenburg, Austria
1982-1987: Assistant Professor at the Institute of Mathematics and Informatics, Bulgarian Academy of Sciences

Visiting positions:
University of Bayreuth, Germany (1993, 1996)
Vienna University of Technology (1994, 1995, 1996, 1997, 1999)
University of Vienna (1995, 96)
Universite de Bretagne Occidentale, France (1997, 1998, 1999, 2000, 2002, 2012, 2019, 2023)
Université des Antilles et de la Guyane (2008, 2013, 2016, 2020)
Oakland University (1998)
University of Florida, USA (1998)
University of Michigan, USA (2012, 2014, 2017, 2019)

Education:
MSc in operations research at University of Sofia (1978), PhD in optimal control theory, Institute of Mathematics and Informatics, Bulgarian Academy of Sciences (1982)

Research areas:
variational analysis
optimal control of ordinary and distributed systems
uncertain systems: identification, estimation, control
dynamic games
operations research and mathematical programming
non-smooth and set-valued analysis
numerical analysis: optimization, optimal control, variational inequalities
mathematical economics
population dynamics and mathematical epidemiology

Funded projects: Leader of 7 Austrian (FWF and FFG) and EU project**s**:

(i) FWF Project "Regularity properties of mappings and applications" (2019-2024)
(ii) FWF Project P 31400-N32 "Optimal control with finite control set and applications in Model Predictive Control" (2018-2023)
(iii) FWF Project P 26640-N25 "Regularity, stability and computation of equilibria" (2014-2017)
(iv) FFG Project No. 608022 "Business Models including Batteries for Smart Grids**"** (2015−2016, leader of the TU-Wien team)
(v) EU-Widespread Project MMAC Nr.557728 "Center of Excellence on Mathematical Modelling and Scientific Computing" (2015−2016, coordinator from TU Wien)
(vi) FWF project P 24125-N13 "Modeling and Control of Contagious Phenomena in Heterogeneous Populations" (2012-2016)
(vii) FWF project I 476-N13 "Endogeneous Heterogeneity and Periodicity in Dynamic Optimization Problems" (2010-2013)

Substantial participation in over 15 other projects in Austria, Bulgaria, and the USA.

Teaching:
Sofia University, University of Vienna, TU Wien, Oakland University (USA);
Courses in calculus, statistics, optimization, optimal control, set-valued analysis

Publications:
Editor of 6 books, over 120 peer-reviewed journal publications, 40 papers in proceedings and books

Editorial board member/associate editor:

European Journal of Mathematics
Dynamics of Continuous, Discrete & Impulsive Systems (B)
Communications in Optimization Theory
Pure and Applied Functional Analysis
Serdica Mathematical Journal

Former assoc. editor of

SIAM Journal on Control and Optimization
Journal of Optimization Theory and Applications
Central European Journal of Mathematics,
Journal of Industrial and Management Optimization
Mathematical Social Sciences

Other scientific activities:
Main organizer of 10 international workshops and conferences; co-organizer of 8 international conferences, more than 200 talks at scientific meetings.

List of Publications

by Vladimir M. Veliov

Edited Books

176. J. Haunschmied, R. Kovacevic, W. Semmler, V.M. Veliov, Eds. *Dynamic economic problems with regime switches* . Springer series *Dynamic Modeling and Econometrics in Economics and Finance*, vol. 25, 2021.

175. J. Haunschmied, V.M. Veliov, and S. Wrzaczek, Eds. *Dynamic Games in Economics.* Springer series *Dynamic Modeling and Econometrics in Economics and Finance*, vol. 16, 2014.

174. E. Moser, W. Semmler, G. Tragler, and V.M. Veliov, Eds. *Dynamic Optimization in Environmental Economics.* Springer series *Dynamic Modeling and Econometrics in Economics and Finance*, vol. 15, 2014.

173. R.F. Hartl, U. Leopold-Wildburger, M. Rauner, G. Sorger, G. Tragler, V.M. Veliov, Eds.: *Special Issue in Honor of Gustav Feichtinger; in Buchreihe "Central European Journal of Operations Research"*, Buchreihen-Herausgeber: U. Leopold-Wildburger, R. Vetschera; Springer Verlag, 2010.

172. A.B. Kurzhanski and V.M. Veliov, Eds. *Modeling Techniques for Uncertain Systems.* Progress in Systems and Control Theory, **18**, Birghäuser, Boston, 1994.

171. A.B. Kurzhanski and V.M. Veliov, Eds., *Set-Valued Analysis and Differential Inclusions.* Progress in Systems and Control Theory, **16**, Birghäuser, Boston, 1993.

Journal Publications

170. R. Cibulka, N.A. Jork, N.P. Osmolovskii, and V.M. Veliov. Strong metric (sub)regularity and applications in optimal control. To appear.

169. N.P. Osmolovskii, V.M. Veliov. Strong metric subregularity of the optimality mapping and second-order sufficient optimality conditions in extremal problems with constraints. To appear in *Communications in Optimization Theory.*

168. L. Schuh, P.V. Markov , V.M. Veliov and N.I. Stilianakis. A mathematical model for the within-host (re)infection dynamics of SARS-CoV-2. *Mathematical Biosciences*, **371**, 109178, 2024.

167. F. Ferraccioli, N. Stilianakis, and V.M. Veliov. A spatial epidemiological model with contact and mobility restrictions. *Mathematical and Computer Modelling of Dynamical Systems*, https://doi.org/10.1080/13873954.2024.2341693.

166. G. Angelov, R. Kovacevic, N.I. Stilianakis, and V.M. Veliov. An immuno-epidemiological model with waning immunity after infection or vaccination. *Journal of Mathematical Biology*, **88**, article number 71, 2024.

165. A.D. Corella, N. Jork, and V.N. Veliov. On the solution stability of parabolic optimal control problems. *Computational Optimization and Applications*, **86**:1035–1079, 2023. https://doi.org/10.1007/s10589-023-00473-4.

164. A.D. Corella, N. Jork, and V.N. Veliov. Solution stability of parabolic optimal control problems with fixed state-distribution of the controls. *Serdica Math. Journal*, **49**:155–186, 2023.

163. N.P. Osmolovskii, V.M. Veliov. On the strong subregularity of the optimality mapping in an optimal control problem with pointwise inequality control constraints. *Applied Mathematics and Optimization*, **87**(3), June, 2023, https://doi.org/10.1007/s00245-022-09959-9.

162. A.D. Corella, N. Jork, and V.N. Veliov. Stability in affine optimal control problems constrained by semilinear elliptic partial differential equations. *ESAIM: Control, Optimization and Calculus of Variations*, **28**(79), 2022.

161. G. Angelov, R. Kovacevic, N.I. Stilianakis, and V.M. Veliov. Optimal vaccination strategies using a distributed epidemiological model applied to COVID-19. *Central European Journal of Operations Research*, September, **31**:499-521, 2023. https://doi.org/10.1007/s10100-022-00819-z.

160. G. Angelov, A. Domnguez Corella, and V.M. Veliov. On the accuracy of the model predictive control method. *SIAM Journal of Control and Optimization*, **60**(2):221–245, 2022.

159. N.P. Osmolovskii, V.M. Veliov. On the Strong Metric Subregularity in Mathematical Programming. *Control and Cybernetics*, *50*(4):457–471, 2021.

158. R. Kovacevic, N.I. Stilianakis, V. M. Veliov. A Distributed Optimal Control Epidemiological Model Applied to COVID-19 Pandemic. *SIAM J. Contr. Optim.*, **60**:221–245, 2022. https://doi.org/10.1137/20M1373840.

157. N.P. Osmolovskii and V.N. Veliov. On the strong subregularity of the optimality mapping in mathematical programming and calculus of variations. *Journal of Mathematical Analysis and Applications*, **500**(1), August 1, 2021, doi.org/10.1016/j.jmaa.2021.125077.

156. A.D. Corella, M. Quincampoix, and V.M. Veliov. Strong bi-metric regularity in ane optimal control problems. *Pure and Applied Functional Analysis,* **9**(6):1119–1137, 2021. Available as Research Report 2020-07, ORCOS, TU Wien, 2020.

155. A.L. Dontchev, I.V. Kolmanovsky, D. Liao-McPherson, M.M. Nicotra, and V.M. Veliov. Sensitivity-based warmstarting for constrained model predictive control. *IEEE Transactions on Automatic Control,* **65**(10):4288–4294, 2020. DOI: 10.1109/TAC.2019.2954359.

154. M. Quincampoix, T. Scarinci, V.M. Veliov. On the metric regularity of affine optimal control problems. *Journal of Convex Analysis*, **27**(2), 2020.

153. S.M. Aseev, V.M. Veliov. Another view of the maximum principle for infinite-horizon optimal control problems in economics. *Russian Math. Surveys*, **74**(6):963–1011, 2019.

152. N.P. Osmolovskii, V.M. Veliov. Metric sub-regularity in optimal control of affine problems with free end state. *ESAIM: Control, Optimisation and Calculus of Variations*, **26**, No 47, 2020. DOI: https://doi.org/10.1051/cocv/2019046 . Available as *Research Report* 2019-04, ORCOS, TU Wien, 2019.

151. A. L. Dontchev, I. V. Kolmanovsky, M. I. Krastanov, V. M. Veliov, and P. T. Vuong. Approximating optimal finite horizon feedback by model predictive control. *Systems&Control Letter*, **139**, 104666, 2020. Available as *Research Report* 2018-07, ORCOS, TU Wien, 2018.

150. E. Augeraud-Veron, R. Boucekkine, V.M. Veliov. Distributed optimal control models in environmental economics: a review. *Mathematical Modelling of Natural Phenomena*, **14**, paper No 106, 2019.

149. A. L. Dontchev, M. I. Krastanov, and V. M. Veliov. On the existence of Lipschitz continuous optimal feedback control. *Vietnam Journal of Mathematic*, **47**(3):579–597, 2019. https://doi.org/10.1007/s10013-019-00347-5.

148. A. L. Dontchev, I. V. Kolmanovsky, M. I. Krastanov, M. M. Nicotra, and V. M. Veliov. Lipschitz Stability in Discretized Optimal Control. *SIAM J. Contr. Optim.*, **57**(1):468–489, 2019.

147. V.M. Veliov and P.T. Vuong. Gradient methods on strongly convex feasible sets and optimal control of affine systems. *Applied Mathematics and Optimization*, 2018. DOI 10.1007/s00245-018-9528-3.

146. J. Preininger, T. Scarinci, and V.M. Veliov. Metric regularity properties in bang-bang type linear-quadratic optimal control problems. *Set-Valued and Variational Analysis*, **27**:381–404, 2019. DOI 10.1007/s11228-018-0488-1.

145. T. Scarinci and V.M. Veliov. Higher-Order Numerical Scheme for Linear Quadratic Problems with Bang-Bang Controls. *Computational Optimization and Applications*, **69**(2):403–422, 2018. DOI 10.1007/s10589-017-9948-z, 2017.

144. P. Grandits, R. M. Kovacevic, V. M. Veliov. Optimal control and the value of information for a stochastic epidemiological SIS-Model. *J. of Math. Anal. and Appl.*, **476**:665–595, 2019.

143. A. Belyakov, A. Davydov, and V.M. Veliov. Optimal cyclic harvesting of a renewable resource. *Dokl. Math.*, **96**(2):472–474, 2017 (English version of [138]). https://doi.org/10.1134/S1064562417050180

142. N.P. Osmolovskii and V.M. Veliov. Optimal control of age-structured systems with mixed state-control constraints. *J. Math. Analysis and Appl.*, **455**:396–421, 2017.

141. R. Cibulka, A. L. Dontchev, M. Krastanov, and V. Veliov. Metrically Regular Differential Generalized Equations. *SIAM J. Control Optim.*, **56**(1):316–342, 2018.

140. A. Pietrus, T. Scarinci, and V.M. Veliov. High order discrete approximations to Mayer's problems for linear systems. *SIAM J. Control Optim.*, **56**(1):102–119, 2018.

139. S. M. Aseev, M. I. Krastanov and V. M. Veliov Optimality conditions for discrete-time optimal control on infinite horizon. *Pure and Applied Functional Analysis*, **2**(3):395–409, 2017.

138. A. Belyakov, A. Davydov, and V.M. Veliov. Optimal cyclic harvesting of a renewable resource. *Proceedings of the USSR Academy of Sciences*, **476**(4):371–374, 2017 (in Russian).

137. R. Cibulka, A. L. Dontchev, J. Preininger, T. Roubal and V. Veliov. Kantorovich-type Theorems for Generalized Equations. *Journal of Convex Analysis*, **25**(2), 459–486, 2018.

136. R. Cibulka, A.L. Dontchev and V.M. Veliov. Lyusternik- Graves theorems for the sum of a Lipschitz function and a set-valued mapping. *SIAM J. Control Optim.*, **54**(6):3273–3296, 2016.

135. V.M. Veliov and A. Widder. Modelling and estimation of infectious diseases in a population with heterogeneous dynamic immunity. *Journal of Biological Dynamics*, **10**(1):457–476, 2016. (DOI: 10.1080/17513758.2016.1221474)

134. V.M. Veliov. Numerical Approximations in Optimal Control of a Class of Heterogeneous Systems. *Computers and Mathematics with Applications*, **70**(11): 2652–2660, 2015.

133. Ts. Tsachev, V.M. Veliov, and A. Widder. Set-membership estimations for the evolution of infectious diseases in heterogeneous populations. *J. Math. Biology*, **74**:1081–1106, 2017, DOI 10.1007/s00285-016-1050-0.

132. V.M. Veliov and A. Widder. Aggregation and asymptotic analysis of an SI-epidemic model for heterogeneous populations. *Mathematical Medicine and Biology*, **32**:1–24, 2015.

131. B. Skritek and V.M. Veliov. On the infinite-horizon optimal control of age-structured systems. *Journal of Optimization Theory and Appl.*, **167**:243-271, 2015.

130. S. Aseev and V.M. Veliov. Maximum principle for infinite-horizon optimal control problems under weak regularity assumptions. *Trudy Inst. Mat. i Mekh. UrO RAN*, **20**(3):41–57, 2014.
Proceedings of the Steklov Institute of Mathematics, 2015, Vol. 291, Suppl. 1, pp. S22S39. Pleiades Publishing, Ltd., 2015.

129. A. Belyakov, A. Davydov, and V.M. Veliov. Optimal cyclic exploitation of renewable resources. *Journal of Dynamical and Control Systems*, **21**:475–494, 2015.

128. A. Belyakov, J.L. Haunschmied, and V.M. Veliov. Heterogeneous consumption in OLG model with horizontal innovations. *Portuguese Economic Journal*, **13**(3):167–193, 2014.

127. A. Davydov and V.M. Veliov. Heterogeneity and periodicity in dynamic optimization problems. (In Russian, English summary.) *Vestnik RFFI*, **81**(1):34–38, 2014.

126. A. Belyakov and V.M. Veliov. Constant versus periodic fishing: age structured optimal control approach. *Mathematical Modelling of Natural Phenomena*, **9**(4):20–38, 2014.

125. B. Skritek, T. Tsachev, and V.M. Veliov. Optimality conditions and the Hamiltonian for a distributed optimal control problem on controlled domain. *Applied Mathematics and Optimization*, **70**(1):141–164, 2014.

124. M. Quincampoix and V.M. Veliov. Metric regularity and stability of optimal control problems for linear systems. *SIAM J. Contr. Optim.*, **51**(5):4118-4137, 2013.

123. C. Simon, B. Skritek, and V.M. Veliov. Optimal immigration age-patterns in populations of fixed size. *J. Math. Anal. and Appl.*, **405**(1):71–89, 2013.

122. S. Aseev and V.M. Veliov. Needle Variations in Infinite-Horizon Optimal Control. In *Variational and Optimal Control Problems on Unbounded Domains*, *Contemporary Mathematics*, **619**:1–17, 2014.

121. A.L. Dontchev, M. Krastanov, R.T. Rockafellar, and V.M. Veliov. An Euler-Newton continuation method for tracking solution trajectories of parametric variational inequalities. *SIAM J. Control Optim.*, **51**(3):1823-1840, 2013.

120. T. Bréchet, C. Camacho, and V.M. Veliov. Model predictive control, the economy, and the issue of global warming. *Annals of Operations Research*, **220**:25–48, 2014. (DOI 10.1007/s10479-011-0881-8).

119. T. Bréche, T. Tsachev and V.M. Veliov. Markets for Emission Permits with Free Endowment: a Vintage Capital Analysis. *Optimal Control, Applications and Methods*, **33**(2):214–231, 2012 (DOI: 10.1002/oca.988).

118. A. Prskawetz, T. Tsachev and V.M. Veliov. Optimal education in an age-structured model under changing labor demand and supply. *Macroeconomic Dynamics*, **16**(2):159–183, 2012.

117. S. Aseev and V.M. Veliov. Maximum Principle for Problems with Dominating Discount. *Dynamics of Continuous, Discrete and Impulsive Systems, Series B*, **19**(1-2b):43–63, 2012.

116. G. Feichtinger, A. Krasovskii, A. Fuernkranz-Prskawetz, and V.M. Veliov. Optimal age-specific election policies in two-level organizations with fixed size. *Central European Journal of Operations Research*, **20**:649–677, 2012.

115. A. Belyakov, T. Tsachev and V.M. Veliov. Optimal control of heterogeneous systems with endogenous domain of heterogeneity. *Applied Mathematics and Optimization*, **64**:287–311, 2011.

114. F. J. Aragón Artacho, A. L. Dontchev, M. Gaydu, M. H. Geoffroy and V. M. Veliov. Metric regularity for Newton's iteration. *SIAM J. Control Optim.*, **49**:339–362, 2011.

113. H. Dawid, ..., V.M. Veliov, F. Wirl. Gustav Feichtinger celebrates his 70th birthday. *Central European Journal of Operations Research*, **18**:437–451, 2010.

112. V.M. Veliov. On the Relationship Between Continuous- and Discrete-Time Control Systems. *Central European Journal of Operations Research*, **18**:511–523, 2010.

111. G. Feichtinger, A. Novak, and V.M. Veliov. Applying the Leitmann-Stalford Sufficient Conditions to Maximization Control Problems with Non-Concave Hamiltonian. *Applied Mathematics and Computation*, **217**:1017–1022, 2010.

110. A.L Dontchev and V.M. Veliov. Metric regularity under approximations. *Control and Cybernetics*, **38**(4):1283–1303 , 2009.

109. H. Dawid, G. Feichtinger, J.R. Goldstein, and V.M. Veliov. Keeping a Learned Society Young. *Demographic Research*, **20**(22):541–558, 2009.

108. A. Pietrus and V.M. Veliov. On the Discretization of Switched Linear Systems. *Systems&Control Letters*, **58**:395–399, 2009.

107. V.M. Veliov. Optimal Control of Heterogeneous Systems: Basic Theory. *J. Math. Anal. Appl.*, **346**:227–242, 2008.

106. C. Saglam and V.M. Veliov. Role of Endogenous Vintage Specific Depreciation on the Optimal Behavior of Firms. *International Journal of Economic Theory*, **4**(3):381–410, 2008.

105. E. Gasca-Leyva, J.M. Hernandez, and V.M. Veliov. Optimal Harvesting Time in a Size-Heterogeneous Population. *Ecological Modelling*, **210**(1–2):161–168, 2008.

104. G. Feichtinger, R.F. Hartl, P.M. Kort, and V.M. Veliov. Financially constrained capital investments: the effects of disembodied and embodied technological progress. *Journal of Mathematical Economics*, **44**:459–483, 2008.

103. G. Feichtinger and V.M. Veliov. On a Distributed Control Problem Arising in Dynamic Optimization of a Fixed-Size Population. *SIAM J. Optim.*, **18**(3):980–1003, 2007.

102. A. Prskawetz and V.M. Veliov. Age specific dynamic labor demand and human capital investment. *Journal of Economic Dynamics and Control*, **31**:3741–3777, 2007.

101. Almeder, C., Feichtinger, G., Sanderson, W., and Veliov, V. Prevention and medication of HIV/AIDS: The case of Botswana. *Central European J. Oper. Res.*, **15**(1):47–61, 2007.

100. J. Caulkins, G. Feichtinger, G. Tragler, and V.M. Veliov. Cycles of violence: a dynamic control analysis. *European J. Oper. Res.*. **181**(1):350–361, 2007.

99. G. Feichtinger, R.F. Hartl, P.M. Kort, and V.M. Veliov. Anticipation effects of technological progress on capital accumulation: a vintage capital approach. *J. Econom. Theory*, **126**:143–164, 2006.

98. G. Feichtinger, R.F. Hartl, P.M. Kort, and V.M. Veliov. Capital accumulation under technological progress and learning: a vintage capital approach. *European J. Oper. Res.*, **172**(1):293–310, 2006.

97. V.M. Veliov. Error analysis of discrete approximations to bang-bang optimal control problems: the linear case. *Control and Cybernetics*, **34**(3):967–982, 2005.

96. G. Feichtinger, R.F. Hartl, P.M. Kort, and V.M. Veliov. Environmental policy, the Porter hypothesis and the composition of capital. *Journal of Environmental Economics and Management*, **50**(2):434–446, 2005.

95. V.M. Veliov. On the effect of population heterogeneity on dynamics of epidemic diseases. *Journal of Mathematical Biology*, **51**:123–143, 2005.

94. M. Krastanov and V.M. Veliov. On the controllability of switching linear systems. *Automatica*, **41**(4):663–668, 2005.

93. M. Quincampoix and V.M. Veliov. Optimal control of uncertain systems with incomplete information for the disturbances. *SIAM J.Contr. Optim.*, **43**(4):1373–1399, 2005.

92. G. Feichtinger, A. Prskawetz, and V.M. Veliov. Age-structured optimal control in population economics. *Theoretical Population Biology*, **65**:373–387, 2004.

91. G. Feichtinger, Ts. Tsachev, and V.M. Veliov. Maximum principle for age and duration structured systems: a tool for optimal prevention and treatment of HIV. *Mathematical Population Studies*, **11**(1):3–28, 2004.

90. V.M. Veliov. Newton's method for problems of optimal control of heterogeneous systems. *Optimization Methods and Software*, **18**(6):689–703, 2003.

89. G. Feichtinger, G. Tragler, and V.M. Veliov. Optimality conditions for age-structured control systems. *J. Math. Anal. Appl.*, **288**(1):47–68, 2003.

88. M. Quincampoix and V.M. Veliov. Solution tubes to differential inclusions within a collection of sets. *Control and Cybernetics*, **31**(3), 2002.

87. M. Quincampoix and V.M. Veliov. Optimal control in presence of unobservable uncertainties. *Comptes Rendus de l'Academie Bulgare des Sciences*, **55**(8):11–16, 2002.

86. R. Moitie, M. Quincampoix, and V.M. Veliov. Optimal control of discrete-time uncertain systems with imperfect measurement. *IEEE Trans. Automat. Control*, **47**(11):1909–1914, 2002.

85. A.L. Dontchev, W.W. Hager, and V.M. Veliov. Second-order Runge-Kutta approximations in control constrained optimal control, *SIAM J. Numerical Anal.*, **38**(1):202–226, 2000.

84. A.L. Dontchev, M.P. Polis, and V.M. Veliov. On the effect of neglecting sensor dynamics in parameter identification problems. *SIAM J. Control and Optim.*, **38**(4):1309–1321, 2000.

83. A.L. Dontchev, M.P. Polis, and V.M. Veliov. A dual method for parameter identification under deterministic uncertainty. *IEEE Trans. Automat. Control*, **45**(7):1341–1346, 2000.

82. A.L. Dontchev, W.W. Hager, K. Malanowski, and V.M. Veliov. On qualitative stability in optimization and optimal control. *Set-Valued Analysis*, **8**:31–50, 2000.

81. A.L. Dontchev, W.W. Hager, and V.M. Veliov. Uniform convergence and mesh independence of the Newton method in optimal control. *SIAM J. Control and Optim.*, **39**(3):961–980, 2000.

80. M. Quincampoix and V.M. Veliov. Open-loop viable control under uncertain initial state information. *Set-Valued Analysis*, **7**(1):55–87, 1999.

79. M. Quincampoix and V.M. Veliov. Control systems with constraints and uncertain initial conditions. *Pliska, Studia Mathematica Bulgarica*, **12**:1001–1014, 1998.

78. F. Lempio and V.M. Veliov. Discrete approximations of differential inclusions. *Mitteilungen der GAMM*, **21**(2):101–135, 1998.

77. F. Lempio and V.M. Veliov. Discrete approximations of differential inclusion. *Bayreuther Mathematische Schriften*, **54**:149–232, 1998.

76. V.M. Veliov. Stability-like properties for differential inclusions. *Set-Valued Analysis*, **5**(1):73–88, 1997.

75. V.M. Veliov. Convergence of the solution set of singularly perturbed differential inclusions. *Nonlinear Analysis, TMA*, **30**:5505–5514, 1997.

74. V.M. Veliov. Generalization of the Tikhonov theorem for singularly perturbed differential inclusions. *J. of Dynamical and Control Systems*, **3**(3):291–319, 1997.

73. V.M. Veliov. On the time-discretization of control systems. *SIAM J. Control Optim.*, **35**(5):1470–1486, 1997.

72. V.M. Veliov. Lipschitz continuity of the value function in optimal control. *J. Optimization Theory and Applications*, **94**(2):335–361, 1997.

71. V.M. Veliov. On the stabilization problem for differential inclusions. *Comptes Rendus de l'Academie Bulgare des Sciences*, **49**(9–10):51–54, 1996.

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69. V.M. Veliov. Computation of integrals of uncertain vector functions. *Interval Computations* (the present *Reliable Computing*), (4):143–153, 1993.

68. V.M. Veliov. Sufficient conditions for viability under imperfect measurement. *Set-Valued Analysis*, **1**:305–317, 1993.

67. B.D. Doitchinov and V.M. Veliov. Parametrisations of integrals of set-valued mappings and applications. *J. Math. Anal. and Appl.*, **179**(2):483–499, 1993.

66. M. Krastanov and V.M. Veliov. Local controllability of state constrained linear systems. *Acta Universitatis Lodziensis, Folia Mathematica*, **5**:103–112, 1992.

65. V.M. Veliov. Second order discrete approximations to linear differential inclusions. *SIAM J. Numer. Anal.*, **29**(2):439–451, 1992.

64. D.D. Bainov, M.A. Hekimova, and V.M. Veliov. Asymptotic procedure for solving boundary value problems for singularly perturbed linear systems with impulses. *Bull. Inst. Math. Acad. Sinica*, **20**(3):211–229, 1992.

63. V.M. Veliov. Discrete Approximations to Integrals of Multivalued Mappings. *Comptes Rendus de l'Academie Bulgare des Sciences*, **42**(12):51–54, 1989.

62. V.M. Veliov. Second order discrete approximations to strongly convex differential inclusions. *Systems & Control Letters*, **13**:263–269, 1989.

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