Project Title	MPC-398 – Selection of Discount Rates for Infrastructure Investment
University	South Dakota State University
Principal Investigator	Xiao Qin, Ph.D., PE Zhiguang Wang, Ph.D.
PI Contact Information	Xiao Qin, Ph.D., PE Assistant Professor Department of Civil and Environmental Engineering South Dakota State University Phone: (605) 688-6355 Email: xiao.qin@sdstate.edu Zhiguang Wang, Ph.D. Assistant Professor Department of Economics South Dakota State University Phone: (605) 688-4861 Email: zhiguang.wang@sdstate.edu
Funding Agencies	USDOT, Research and Innovative Technology Administration
Agency ID or Contract Number	DTRT12-G-UTC08
Project Cost	\$51,013
Start and End Dates	2012 - 2013
Project Duration	9 Months
Brief Description of Research Project	Transportation Infrastructure Investment (TII) is crucial to enhance economic competitiveness of South Dakota and the nation as a whole. The key to identify a financially feasible and socially rewarding TII project that spans over years is the determination of an appropriate discount rate. An overly optimistic (low) discount rate may lead the decision makers at SDDOT to accept a financially unsound project at the expenses of taxpayers and vice versa. The discount rates suggested by the Department of Transportation (USDOT) for projects with significant funding from the federal government may not be the most appropriate at the state level (Federal Register, 2012), because the opportunity cost of the funds for South Dakota and overall project risks in South Dakota differ from the national level. The need for determining optimal discount rates for TII projects become even more pronounced with both nation-wide and state-level budget constraints. There is a lack of study on the selection of discount rates for TII projects in the literature (Boscolo et al 1998) and by peer transportation agencies (see Iowa and other TIGER grants), which motivates the research. The objective of the research project is to examine and evaluate

	methods for establishing sound and equitable discount rates used to plan and program transportation infrastructure investment in South Dakota.
Describe Implementation of Research Outcomes (or why not implemented)	
Place Any Photos Here	
Impacts/Benefits of Implementation (actual, not anticipated)	
Web Links Reports Project Website	https://www.ugpti.org/resources/reports/details.php?id=784