Field	Response
1. Contact Information   Name	Ajay Dalai
1. Contact Information   Department	Chemical and Biological Engineering
1. Contact Information   Email	ajay.dalai@usask.ca
1. Contact Information   University	Saskatchewan
1. Contact Information   Personal Web Page	<u>http://engineering.usask.ca/faculty-</u> <u>staff/cbe/ajay-dalai/index.php</u>
1. Contact Information   Phone	306 966 4771
2. Please indicate the alignment of your research expertise to one or more of the following GWF objectives/ deliverables:	Inform adaptation to change and risk management - propose governance mechanisms, management strategies, and policy tools to reduce the risk of water threats, design adaptive strategies, and enhance economic opportunities
3.1 Please indicate the alignment of your research expertise to the GWF Science Pillar 1 – Diagnosing and Predicting Change in Cold Regions:	Water Quality and Aquatic Ecosystems – improve understanding and prediction of how climate changes in climate, hydrology, and land use impact water quality and the health of aquatic ecosystems Human–Water Systems – address the human dimensions that will determine water futures, including governance, policy, communities, border, and water resources management Water and Health – determine how changes to climate, extreme events, hydrology and water quality will affect human health in urban, rural and Indigenous communities
3.2 Please indicate the alignment of your research expertise to the GWF Science Pillar 2 – Developing Big Data and Decision Support Systems:	Decision Support Systems – predictive and diagnostic modelling system development and deployment for hydrology, water quality and water resources

Field	Response
3.3 Please indicate the alignment of your research expertise to the GWF Science Pillar 3 – Designing User Solutions:	Agriculture – including farming, food processing, country foods Energy & Natural Resources – including mining and hydroelectricity Other Industry – Including Insurance, Finance, Measurement and Engineering sectors Urban and Rural Communities Indigenous Communities
4. Please indicate the alignment of your research expertise to one or more of the following user needs:	Knowledge mobilization for decision support, including the facilitation of communities of practice, stakeholder engagement with science, visualization and Decision Theatres, development of place-based solutions for climate adaptation, and evidence-based decision making. Merging Indigenous traditional knowledge with science for more effective climate adaptation, risk management, water governance, and sustainable development. Studies of environmental change and long-term, generational impacts of economic development on First Nations ecosystems and water resources.
5. Please list regions of Canada and the biomes (e.g. mountains, boreal forest, Great Lakes-St Lawrence), watersheds, and/or river basins where you are interested in conducting research for GWF:	Water quality monitoring, and remediation and recycling of used/contaminated water at various industrial sites and rural sites in Canada, in particular in Saskatchewan and Alberta
6. Please list any other expertise or recent experience (subjects, river basins, technology) not covered by above query that could help us in assessing your alignment with the GWF programme:	<ul> <li>-Waste water treatment from oil sands contaminated sites.</li> <li>-Determination of water quality and treatment of water discharged to environment from industrial sites such as mining, refining, water treatment facility, pulp and paper industry, pharmaceutical production, textile etc.</li> <li>Determination of water quality from lakes, rivers, ponds, and remote locations where water is used for drinking purposes.</li> <li>Expertise include use of innovative techniques for water quality determination and its treatment for recycling purposes as well as safe discharge to environment.</li> </ul>