

CES EXPERTISE IN CLIMATE CHANGE

Climate change is considered by many as one of the most significant global challenges with far reaching implications for ecosystems, communities and businesses. By applying our broad range of in-house expertise, CES has been well-positioned to provide climate change-related advisory services to clients in the public and private sector.

CES SPECIALISES IN ENVIRONMENTAL AND SOCIAL ADVISORY SERVICES

CES has been providing climate change-related advisory services for over 20 years and has been actively promoting awareness of climate change and advising of the associated risks among public and private sector clients.

Recent United Nations Intergovernmental Panel on Climate Change (IPCC) reports indicate that climate change impacts are anticipated be more severe than initially expected, will persist for millennia into the future, and that Africa will be particularly vulnerable to these effects. Importantly, the impacts will be experienced most acutely by vulnerable communities whose livelihoods depend on availability of natural resources.

Potential manifestations of climate change include increased temperatures, changes in rainfall patterns, increased storm events and sea-level rises, which will have further secondary and cumulative impacts. Some of these impacts include reduced viability of animal and crop farming due to increased diseases and droughts, vulnerability of coastal infrastructure because of sea-level rises, storms and tidal surges, and loss of bio- diversity due to change in climatic conditions.

All sectors of civil society (public and private sectors) need to consider both adaptation to and mitigation of climate change in their respective project implementation programmes and strategic planning exercises to avoid or minimise vulnerability to climate change, or to be able to adapt to predicted impacts. For businesses, potential disruption of key supply chains represents a potentially significant risk that needs to be understood and planned for.

2

With regard to mitigation, opportunities should be explored to reduce reliance on energy or other processes consuming fossil fuels, avoid land-uses that result in the loss of sequestered carbon and identify opportunities to increase carbon sequestration.

CES has been providing climate change-related advisory services for over 20 years and has been actively promoting awareness of climate change and advising of the associated risks among public and private sector clients. Much of this work has focused on public sector clients where we have assisted in identification of climate change risks and the development of strategies to respond to these risks. We have also introduced them to technologies that will assist them to reduce their greenhouse gas emissions or carbon footprint. In addition, we have developed climate change risk assessments and greenhouse gas emission inventories for various clients in the energy, mining and agri-processing sectors. For these studies we are guided by the thresholds defined by the International Finance Corporation's Guidance Note for PS 3, and the various guidelines developed by the IPCC.

For more information see www.cesnet.co.za



SELECTED ENVIRONMENTAL PROJECTS SPECIFIC TO CLIMATE CHANGE

- ✓ Climate Change Impact Assessment and Green House Gas Emissions Assessment for a 140 MW wind farm located near Springbok in the Northern Cape Province.
- ✓ Climate Change Impact Assessment Green House Gas Emissions Assessment for a 200 MW wind farm located near Touwsrivier in the Western Cape Province.
- ✓ Climate Change Readiness Strategy for the Amatola Water utility located in the Eastern Cape Province.
- ✓ Climate Change Impact Assessment and Green House Gas Emissions Assessment for a 75MW solar park near Upington in the Northern Cape Province.
- ✓ Climate Change Impact Assessment for a 5 MW hydropower project located near Bethlehem in the Free State Province.
- ✓ Climate Change Impact Assessment Green House Gas Emissions Assessment for a proposed mining operation located in Sierra Leone.
- ✓ Climate Change Impact Assessment for a 140MW wind farm located near Gqeberha in the Eastern Cape Province.
- ✓ Climate Change Impact Assessment for a 75 solar PV facility located near Upington in the Northern Cape Province.
- ✓ Mapped vulnerable coastal areas for Buffalo City Metropolitan Municipality as part of its climate change adaptation strategy.
- ✓ Peer Review of the Climate Change Risk Assessment and Greenhouse Gas Emissions Assessment for the Proposed 750 MW Thabametsi Coal Fired Power Station.
- ✓ Climate Change Risk Assessment and Greenhouse Gas Emissions Assessment for the Proposed 700 MW coal-fired power generation facility in San Pedro, Cote d'Ivoire.
- ✓ Involved in the development of the South African Web-based climate change response monitoring and evaluation system.
- ✓ Carbon Stock and Greenhouse Gas Life Cycle Assessment for a bioethanol project in Sierra Leone.
- ✓ Carbon Stock and Greenhouse Gas Life Cycle Assessment for a biodiesel project in Mozambique.
- ✓ Development of the Buffalo City Metro Climate Change Strategy, South Africa.
- ✓ Development of the Eastern Cape Province Climate Change Response Strategy, South Africa.
- ✓ Amathole District Municipality Climate Change Vulnerability Assessment and Response Framework, South Africa.
- ✓ Chris Hani District Municipality Climate Change Framework Plan, South Africa.
- ✓ Transnet National Ports Authority Climate Change Strategy, South Africa.

