



Pressure release waterproofing of Cave

Region	Arunachal Pardesh (India)
Type	Pressure release water proofing (PVC Membrane)
Main Contractor	Indian Army
Execution of the work	Renesco India Private Limited
Construction Period	2017– 2018

Project Description

Work at high altitude makes any project challenging. Main challenge of the project was its extreme locations and rough weather and terrain. From excavation has to be done through drill & blast, and pressure release waterproofing system has to be applied, using PVC membrane of 2.0 mm thick, on the surface of caves which will prevent any water seepage or flow coming from cave surface and the water will be diverted to drainage system that is one of a main component of pressure release waterproofing system

Scope of work

Supply and installation of following items to cover all the surface areas of the structures

- Dimple drainage board with minimum 8.0mm dimple height compressive strength 250kN/m²
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- 2.0mm thick PVC-P waterproofing membrane
- 1.5mm thick protection sheet
- 4.0mm thick welded wire mesh made up of mild steel
- Spray of 8.0mm down concrete of mix grade M35 over installed waterproofing system 100mm thickness in vertical and 150mm in invert surface
- Spray of 8.0mm down concrete of mix grade M35 over rock profile behind the existing fibre sheet
- laying of perforated PVC drain pipe covered with filter media of size 20mm-30mm
- PVC anchor (it is a hard pvc shell with flange and welded with pvc membrane for fixation of welded wire mesh)
- Termination of PVC membrane by means of high quality adhesive
- **System installed as per DVS 2212 guidelines by trained and certified PVC welders.**

