Fortune Minerals – NICO Project

Water Quality Closure







Water Quality - Closure



Closure Plan Update

- Filling of the open pit
 - Fortune was requested to consider an alternative to the passive filling of the open pit
 - > Fortune will use the Marian River as the primary source
 - > ~12 years for the open pit to fill rather than ~120 years

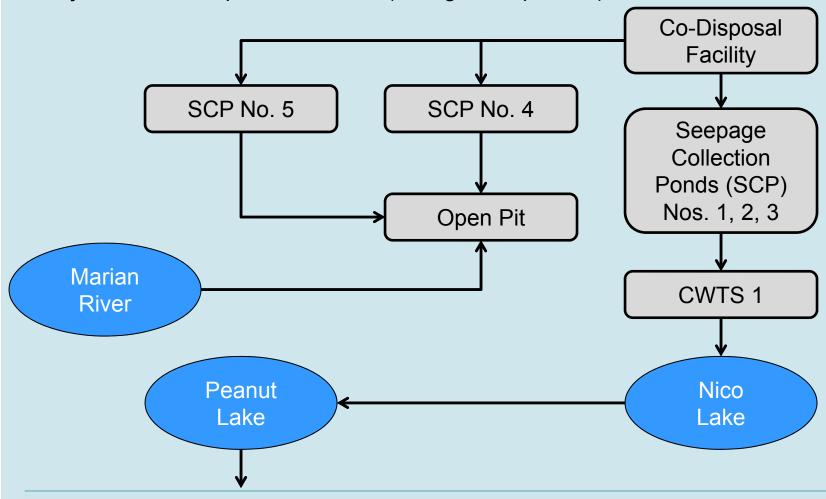




WQ Model Components – Closure



Project Related Inputs – Closure (Filling the Open Pit)



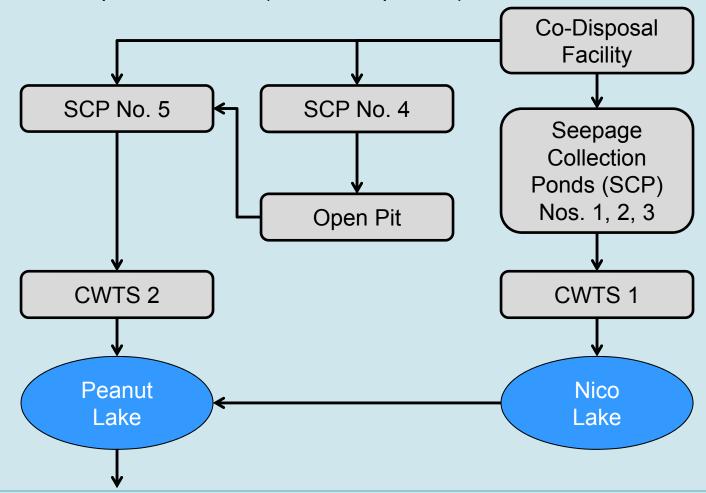




WQ Model Components - Closure



Project Related Inputs – Closure (Flooded Open Pit)







Water Quality - Closure



Key Assumptions:

- Same modelling framework as Operations
- Active open pit filling using water from Marian River
- Flows from SCP Nos. 1, 2, and 3 follow drainage course through CWTS 1 prior to drainage to Nico Lake
- Overflow from filled open pit follows drainage course through CWTS 2 prior to drainage into Peanut Lake





Water Quality – Closure



- Flows from the SCPs to Nico Lake and flooded open pit overflow to Peanut Lake without CWTS may result in some metals higher than SSWQOs
- The use of CWTS at the drainage points of the SCPs and flooded open pit overflow will substantively improve the quality of drainage to these lakes and meet SSWQGs
- The chemical characterization of Nico and Peanut lakes will continue to improve as water moves downstream
- The changes in water quality to the Marian River are expected to be negligible





Water Quality – Closure



- Without CWTS, negligible adverse effects to aquatic life, wildlife, and humans from changes in water quality are predicted in Nico, Peanut, and Burke lakes and Marian River
- CWTS will provide an added level of protection in closure and post-closure
- Changes to people's opportunity for traditional use of the Marian River from the NICO Project will be negligible

