Case Study

PROJECT NAME:	Richards Bay Industrial Main
Community/Country:	Richards Bay, Kwazulu Natal, South Africa
Amiantit entity	Amitech South Africa
Description: *project (short abstract)*	2500m DN1200 line in Richards Bay through swampy areas
application:	Supply of water to city
transported medium	Potable Water
working pressure	PN10
type:	☒ new installation
demanded standards / specifications / approvals:	All pipes to be accompanied by Quality documentation. All pipes to be manufactured according to standard specifications.
Special requirement on pipe-system:	To withstand aggressive soil conditions.
project value in US$:	Approx US $1,000,000



	*opted pipe system:*	☒ GRP round filament
	other materials in this project?	GRP in the main line and steel in the chambers.
	why our product?	☒ corrosion resistance ☒ flow characteristics ☒ Cost.

owner (name, town):	Richards Bay Municipality, KwaZulu Natal
consultant / engineer: (name, town)	Thomas Maduraimuthu from PD Naidoo & Associates, Richards Bay
contractor: (name, town)	Leomat Construction, Richards Bay
Pipe Details – material 1:	
Total length supplied (m)	2500
Diameter min/max (mm):	800, 1200
Pressure PN min/max (bar):	10, 16
Stiffness DN min/max (N/m^2):	5000
joint types:	Reka
fittings used:	Bends, Air Valve and Scour Valve Tees

Installation Details:	
type:	☒ open trench
trench dimensions (m)	2
laying depth (m)	3
native soil type	SC2
backfill soil type / compaction	SC2
thrust blocks/ lockjoints	No thrust blocks to date. These will come later in the contract
deflection min/max in degrees	0 – 1,5





quality measures during installation	All joints have been visually inspected. Testing will be done between chambers. Compaction tests are being done every 30m at every level.

Duration-months	To date 4 Months. Currently laying in the region of 3 pipes per day.
Year start	May 2009
Year end	March 2010
Summary:	Exciting project in this region due to the size with lots of interest from municipalities and water service suppliers in the region.
Owner/Consultant/ Contractor comments:	Thomas Maduraimuthu, the consulting engineer, is very content with the progress of the installation and satisfied with the supporting documentation we have supplied on our standards.