WG Urban Problems – Underground Solutions
Questionnaire on Failed Urban Underground projects

Working Group 20 of the ITA focuses on underground solutions for urban problems. Currently the WG is looking at factors that determine whether in the long term projects are judged as successful. In contrast to the short term image of failure that may surround many projects due to construction mishaps or budget overruns, most projects, once completed, will start to fulfil their intended function and be deemed successful by the general public. An earlier inventory by the WG has shown that many projects that are widely criticised in the press or by stake-holders during construction are judged as successful in the long run. No clear factors have been identified yet that can be used as indicators for the future success.

Given that perspective, the WG is taking the inverse approach and collecting case histories for projects that are deemed as unsuccessful in the long run. We request your input to provide as complete a list as possible.

This questionnaire serves to identify unsuccessful projects – based on your point of view – to obtain some key figures and pointers, and where possible to get additional background information. It is not necessary to fill in all fields. Please provide information where possible.

I thank you in advance for helping us out.
Wout Broere – Chair of WG20

TAC is collecting Canadian responses in order to reply to WG 20 with a comprehensive Canadian overview on factors contributing to unsuccessful underground projects.

Please send the completed questionnaire to:
(if possible, please send questionnaire and attachments electronically by e-mail)

Tunnelling Association of Canada
8828 Pigott Rd
Richmond BC  V7A 2C4
Canada

Phone: 604-241-1297  Email: admin@tunnelcanada.ca

Information in this questionnaire was provided by:

Name:
Company:
Function/Position:
Address:
Country:
Phone:
Email:
**General Information about the chosen project:**

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<th>Name of the project:</th>
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**Overview of sources for information on the project:**
(please provide links to webpages, newspaper or journal articles, reports of public enquiries, etc. where more information on the project could be obtained)

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<th>Contact Person for further information on project:</th>
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<th>Name and address of main contractor / joint venture:</th>
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Why is the project deemed unsuccessful:
Mark with (x) as appropriate, strike out/delete options as appropriate

Factors contributing to failure of the project:
(   ) Project never completed
(   ) Budget overruns
(   ) Financiers backed out/public financing retracted/private financing retracted
(   ) Client cancelled the project
(   ) Engineering firm/design office resigned/went out of business
(   ) Contractor went out of business
(   ) Initial projected construction time exceeded
(   ) Construction failure/ major incidents during construction
(   ) Construction failure/ major incidents after project completion
(   ) Resistance of the general public before/during/after construction
(   ) Resistance of the decision makers before/during/after construction
(   ) Architectural factors
(   ) Environmental factors
(   ) Project never completed
(   ) Project never completed
(   ) Other:

Point of view/role of the person assessing this project as unsuccessful:
(e.g. client, engineer, contractor, general public, decision maker, press)

Brief description of the reasons the project failed (approx. 1/4 to 1/2 page):
(please describe why in your point of view the project failed in the long term and which factors contributed to this)
Technical Information about the chosen project:

Budget (if still under construction) or cost (if already built):

Location, City, Country:

Duration of planning:
(i.e. Months: 36, from: January 2001, to: December 2003)
Months: from: to:

Duration of construction:
Months: from: to:

Brief technical description of the project (approx. 1/4 to 1/2 page):
(please describe function and dimensions, i.e. length, depth below surface, ground water pressure, volume, diameter, ground conditions, construction method, etc.)

Please provide approximately 5 (if possible electronic) pictures or sketches, which capture the typical qualities of the project!
Pictures provided: ( ) yes
please mark with (X) ( ) no
Urban problems intended to be solved or reduced by the project:

Please mark (X) the topics addressed by the project:

(   ) Architectural quality of urban environment has to be improved
(   ) Service quality of the urban environment has to be improved
(   ) Safety and security in urban environment has to be improved
(   ) Additional traffic capacities are needed for public transport
(   ) Additional traffic capacities are needed for individual and freight transport, Relief from traffic congestion is needed
(   ) Time savings in transport are necessary
(   ) Noise levels are not acceptable
(   ) Pollution (esp. air pollution) is not acceptable
(   ) Protection from natural hazards (flood, storm, earthquake, etc.)
(   ) Valuable surface space must be kept available or become available again
(   ) Underground utility lines are not serviceable and should become serviceable,
(   ) Open trench works for utility lines cause an unacceptable obstruction of traffic
(   ) urban planning for combination of functions
(   ) Connections between different traffic modes
(   ) protection shelters for large crowds needed
(   ) Seismic protection
(   ) Other (please specify): 

Please describe the addressed topics in some more detail (approx. 1/4 to 1/2 page):
Type of solution chosen for the project:

Please mark (X) the type and/or use of the solution:

( ) Underground Transport
( ) Energy or energy production
( ) Underground housing
( ) Subway systems, underground light rail, underground rail
( ) Road tunnels
( ) Pedestrian tunnels
( ) Underground parking
( ) Underground manufacturing
( ) Underground theatres and concert halls
( ) Underground shopping facilities
( ) Underground public service facilities (archives, libraries, swimming pools)
( ) Underground plants (sewage treatment)
( ) Underground scientific facilities
( ) Underground storage
( ) Pipeline transport systems
( ) Sewerage systems
( ) Storm water relief systems
( ) Accessible utility tunnels
( ) Creation of multifunctional and multi-modal hubs (underground rail + underground road + parking + recreational facilities + shopping facilities)
( ) recreation facilities
( ) tunnels for waterways
( ) Other (please specify):

Please describe the solution type in some more detail (approx. 1/4 to 1/2 page):
Any other remarks you may have:

If there are any remaining remarks or comments on the project you wish to make:

Thank you very much for your time and cooperation!
ITA WG-20