МЕМО						
TO:	Board of Directors	FROM:	Breege Rooney			
		<b>DATE:</b> 15 November 2000				
CC:		DAIE:	15 November 2000			
SUBJECT: Southern Excavations Ltd, Aghfarrel Inert Landfill - Technical Committee Report on Objections to Proposed Decision – Reg. No. 84-1.						

Application Details		
Applicant:	Southern Excavations Ltd.	
Location of Activity:	Aghfarrel, Brittas, Co. Dublin.	
Reg. No.:	84-1	
Proposed Decision issued on:	11/08/00	
Objections received:	05/09/00, 06/09/00	
Circulation of objections:	11/09/00	
Inspector:	Ms. Margaret Keegan	

Objections Received	Date Received
Objection by Applicant:	06/09/00
Southern Excavations Ltd.,	
Bridge Street, Cappamore,	
Co. Limerick.	
<b>Objection by Third Party/Parties</b> :	05/09/00
1. Mr. Michael McCoy, Secretary,	
Dublin Mountain Conservation &	
Environmental Group, Ballinascorney	
Upr., Brittas, Co. Dublin.	
Submission on Objection (s):	03/10/00
1. Mr. Michael McCoy, Secretary,	
Dublin Mountain Conservation &	
Environmental Group, Ballinascorney	
Upr., Brittas, Co. Dublin.	

## Consideration of the objections.

The Technical Committee (Breege Rooney, Chairperson, Damien Masterson and Malcolm Doak, committee members) has considered all of the issues raised and this report details the Committee's comments and recommendations following the examination of the objections.

## **Objection No.1: Southern Excavations Ltd. (06/09/00)**

## Ground 1

Southern Excavations Limited (SEL) states that their technical advisors and themselves have examined the issued licence (PD). SEL states that in general, it considers that the document does not take account of the fact that the site is essentially a waste transfer and recycling facility with landfilling of inert C & D material only. No biodegradable waste of any kind will be disposed of on site, therefore, it is argued that many of the conditions contained within the PD, i.e. lining, gas monitoring, meteorological data collation, etc., are excessive and applicable to refuse landfill sites rather than an inert facility such as that existing at Brittas. SEL's specific objections are outlined below.

## Technical Committee's evaluation

The Technical Committee notes that the Landfill Directive (Council Directive 1999/31/EC on the landfill of waste) will apply to <u>all landfills including inert</u> landfills and is currently considered to represent best practice. The Landfill Directive sets out general requirements in relation to: gas control; protection of soil and water including specification for liners; and for the collection of meteorological data (Annexes I, II and III to the Directive). These requirements were considered when assessing this facility.

## Ground 2 – Condition 4.14

This objection argues that the requirement to line the inert landfill unit is unnecessary and again fails to accept the nature of the waste being disposed of on site (i.e. C & D waste only).

# **Condition 4.14 Landfill Lining**:

## Condition 4.14.1

The landfill liner for all cells shall at a minimum meet the following requirements;

Base and side wall mineral layer of a minimum thickness of 1m with a hydraulic conductivity less than or equal to  $1 \times 10^{-7}$  m/s or a minimum thickness of 0.5 m artificial layer of enhanced soils or similar, giving equivalent protection to the foregoing.

## Technical Committee's evaluation

The Technical Committee notes that the applicant applied for the landfilling of inert waste only. The Landfill Directive (Section 3.4) states that "*if, on the basis of an assessment of environmental risks taking into account, in particular, Directive 80/68/EEC, the competent authority has decided, in accordance with Section 2 'Water control and leachate management', that collection and treatment of leachate is not necessary or it has been established that the landfill poses no potential hazard to soil, groundwater or surface water, the requirements in paragraphs 3.2 and* 

3.3 above" (relating to geological barriers and leachate collection and bottom sealing) "may be reduced accordingly. In the case of landfills for inert waste these requirements may be adapted by national legislation."

The Technical Committee is satisfied that the Proposed Decision (PD) contains sufficient controls to ensure that only inert waste will be deposited in the landfill. As such, the requirements of the Proposed Decision will ensure that this facility will pose no potential hazard to soil, groundwater or surface water and will not cause environmental pollution. These controls include the following requirements: (Condition 5.2.1) - that only C & D waste types shall be recovered or disposed of at the facility and that wastes that exceed the limit values set in Schedule G.4 of the PD shall not be landfilled at the facility; (Condition 5.2.2) – that only construction and demolition waste from excavations and waste removal activities carried out by Southern Excavations Ltd. shall be accepted at the facility and (Condition 5.2.3) – that waste analysis testing (Schedule G) shall use standardised and internationally accepted procedures and shall be carried out by a competent laboratory and that the details be agreed with the Agency prior to waste acceptance at the facility.

The waste (Condition 5.3) must undergo detailed and comprehensive waste acceptance and waste characterisation procedures before it can be disposed of at this facility. This involves assessment of the waste including chemical analysis against strict criteria set out in Schedule G of the PD. Compliance testing of a representative sample of waste against these Limit Values is required every 100 loads accepted and on-site verification is required for every load. A waste inspection and waste quarantine area are required under Condition 4.7.1. Conditions 3.10 and 3.11 set out requirements for the maintenance of written records for each load of waste arriving at the facility.

In light of the above, the Technical Committee considers that a liner is not necessary for this inert landfill and it is recommended that the requirement for a liner (Condition 4.14) be removed from the PD and that the PD be amended as detailed below to facilitate this recommendation. In the absence of a liner, there will be no leachate collection and the Technical Committee also recommends removing references to leachate collection and leachate monitoring from the PD. In addition, please refer to the recommendations arising from the Agency's consideration of Ground 8 of the Objection by Dublin Mountain Conservation & Environmental Group, received 05/09/00, later on in this report.

## Recommendation

Delete Conditions 4.14 and 4.14.1 and amend numbering of subsequent conditions as appropriate.

## Schedule C: Recording and Reporting

Delete following row from Table C.1 Recurring Reports – "Monitoring of Leachate / Quarterly / Ten Days after end of quarter being reported on".

# Schedule D: Specified Engineering Works

Delete the words **"and lining"** from the first sentence "Development of Phases and future cells of the facility including preparatory works **and lining"**.

Delete the words "(including any containment works relating to leachate control)" from the second sentence in Schedule D.

# Schedule E: Monitoring:

Amend title of Schedule E.4 to "Surface Water and Groundwater" deleting words "and leachate".

Delete paragraph directly after Table E.4.2 – **"Leachate monitoring locations.....in Table E.4.4."** 

Delete **Table E.4.3 - Leachate Monitoring Locations.** And re-number tables accordingly.

# Table E.4.4:

Amend title to read **"Table E.4.4 Surface Water and Groundwater – Parameters/Frequency".** Delete entire column headed **"LEACHATE Monitoring Frequency".** Delete entire row **"Leachate Level / Not Applicable / Monthly".** 

# Ground 3 – Condition 5.7

Southern Excavation Limited (SEL) notes the requirement of Condition 5.7, that waste may only be accepted between the hours;

March to October – 08.00 to 18.00 Monday to Friday inclusive, 08.00 to 14.30 Saturday and

November to February – 08.00 to 17.00 Monday to Friday inclusive and 08.00 to 14.30 Saturday.

Southern Excavation Limited requests that the condition is amended to permit waste acceptance between the hours of 06.00 - 20.00 because of the disimproving traffic situation and the nature of the waste generation business in the C & D sector where demolition and excavation can occur very early or indeed right into the night. SEL stress that such a change could be used to improve the traffic situation in a busy urban area by ensuring that the waste collection fleet on the roads was minimised during peak rush times. SEL considers that an extension in the operation hours at their facility is critical to their operation.

# Condition 5.7

Waste shall only be accepted at the facility between the hours below unless otherwise agreed in advance with the Agency. Wastes shall not be accepted on bank holidays.

# March to October

between the hours of 0800 to 1800 Monday to Friday inclusive and 0800 to 1430 on Saturdays and

# November to February

between the hours of 0800 to 1700 Monday to Friday inclusive and 0800 to 1430 on Saturdays.

# Technical Committee's evaluation

The Technical Committee notes that the hours for acceptance of waste at the facility specified in Condition 5.7 of the PD, are as detailed on Page 14 of Volume 1 of the EIS as submitted with the waste licence application. The Technical committee notes that the revised hours for waste acceptance requested in Ground 3 have not previously been outlined or considered. Therefore the Technical Committee recommends that an extension of hours for waste acceptance be refused.

#### Recommendation

#### No Change.

#### Ground 4 – Condition 9.2

This objection argues that because of the unlikelihood of gas generation and migration at the site it is argued that the requirements of Condition 9.2 and indeed the requirements stipulated in Schedule C, D and E relating to landfill gas are over excessive and totally unnecessary. Southern Excavation Ltd. states that these requirements are similar to that required from domestic refuse landfills and as such do not or should not be imposed on the Brittas facility. Condition 9.2 requires the installation of a permanent gas monitoring facility at the site office (and within three months) this is total overkill and imposes an unnecessary financial burden on the company.

#### Condition 9.2

Prior to the commencement of waste activities, the licensee shall install a permanent gas monitoring system in the site office and any other enclosed structures at the facility.

#### Technical Committee's evaluation

The Technical Committee notes that some historical landfilling of waste including an unknown percentage of biodegradable waste took place at the facility and the PD requires that landfill gas should be monitored. However, in light of the fact that no further disposal of biodegradable waste will be permitted at the site, the Technical Committee considers that quarterly monitoring would be an adequate check for landfill gas generation and recommends amendment of the monitoring frequency from monthly to quarterly. However the Technical Committee believes that a permanent gas monitor should be installed in the site office. For the purposes of clarity, the Technical Committee also recommends amendment of the section in Schedule D relating to landfill gas.

#### Recommendation

#### Schedule D: Specified Engineering Works:

Delete the words **"management and"** from the sentence "Installation of landfill gas **management and** monitoring systems including permanent systems".

#### **Schedule E: Monitoring:**

Table E.1.2 Landfill Gas Monitoring Frequency and Technique – Amend monitoring frequency in column 2 from "monthly" to "quarterly".

#### Ground 5 – Condition 11.1

SEL notes that Condition 11.1 sets the annual contribution at £14,382 and state that this is grossly excessive when compared to similar licenses already issued or at PD stage. SEL considers that the fees were again set on the erroneous assumption that the site operates a refuse landfill. SEL states that the contribution should be recalculated to reflect the fact that the site consists primarily of a waste transfer and recycling centre with the ancillary C & D disposal area.

#### **Condition 11.1 – Agency Charges**

#### Condition 11.1.1

Southern Excavations Ltd.

The licensee shall pay to the Agency an annual contribution of £ 14,382 or such sum as the Agency from time to time determines, towards the cost of monitoring the activity or otherwise in performing any functions in relation to the activity, as the Agency considers necessary for the performance of its functions under the Waste Management Act, 1996. The licensee shall in 2001 and subsequent years, not later than January 31 of each year, pay to the Agency this amount updated in accordance with changes in the Public Sector Average Earnings Index from the date of the licence to the renewal date. The updated amount shall be notified to the licensee by the Agency. For 2000, the licensee shall pay a pro rata amount from the date of this licence to  $31^{st}$  December 2000. This amount shall be paid to the Agency within one month of the date of grant of this licence.

## Technical Committee's evaluation

The Technical Committee carried out a detailed assessment of the annual contribution and compared it with other similar facilities. The Technical Committee recommends a revised charge of  $\pounds 12,522$ .

#### Recommendation

Amend Condition 11.1.1 as follows: Delete  $\pounds 14,382$  and insert  $\pounds 12,522$ .

## Ground 6 – Schedule E.5 – Meteorological Monitoring

Southern Excavation Limited understands that Schedule E.5 requires the establishment of a meteorological station at the site. The Management of Southern Excavation Limited strenuously object to this primarily on the basis that this is generally only required at refuse landfills where leachate production and treatment may be of concern. This is emphatically not the case on the Brittas site. They also state that similarly, the requirement for windspeed and direction related to dust blow or gas production is an issue of little concern on their site and that the costs associated with this condition are considerable.

## Technical Committee's evaluation

The Technical Committee notes that Schedule E.5 Meteorological Monitoring requires that the licensee obtain meteorological data from a Met. Eireann Station and does not require the establishment of a meteorological station. Therefore, the Technical Committee recommends no substantial change to Table E.5.1. However, it is recommended to replace the word "approved" with "synoptic" for reasons of clarity. The synoptic stations send in weather observations on an hourly basis and provide more detailed information than climatic stations.

## Recommendation

Amend Schedule E: Monitoring - E.5.1 Meteorological Monitoring as follows: Delete the word "approved" and amend sentence directly above table to read "Data to be obtained from nearest Met. Eireann Synoptic Station".

Ground 7 – Schedule B

Schedule B requires that the AER includes an estimation of annual and cumulative quantities of landfill gas emitted from the facility, in addition to a monthly water balance calculation and interpretation. Again, this assumes that the facility receives waste other than inert C&D. Southern Excavation Ltd. contend that these requirements should be removed.

# Technical Committee's evaluation

The Technical Committee notes that the licensee is required, under Schedule B: Content of Annual Environmental Report, to provide an estimation of annual and cumulative quantities of landfill gas emitted from the facility. The Technical Committee considers that if results of landfill gas monitoring demonstrate that little or no landfill gas is generated and bearing in mind the fact that no disposal of biodegradable waste will be permitted, then the content of this section of the AER will be minimal. In light of the fact that it is recommended to remove the requirement for a liner system for the landfill, the Technical Committee considers that the requirement for a monthly water balance calculation is necessary so as to provide an indication of the hydraulic throughput in the landfill. Therefore, the Technical Committee proposes no change to Schedule B of the PD.

# Recommendation

No Change.

# Objection No 2: Dublin Mountain Conservation & Environmental Group (05/09/00)

The Dublin Mountain Conservation & Environmental Group (D.M.C & E.G) state that they would like to strongly object to the granting of a Waste Licence to Southern Excavations Ltd. at Aghfarrel, Brittas, Co. Dublin. The following are the grounds of their objection.

# Ground 1

The D.M.C & E.G. believe that the decision would create an unnecessary risk to both groundwater and drinking water.

# Technical Committee's evaluation

The Technical Committee considers that the controls required by the PD are adequate for the protection of Surface Water and Groundwater.

The surface runoff from hardstanding areas of the proposed site are to be collected and passed through an oil interceptor and a grit trap. In addition, all surface water is to be collected prior to discharge to the adjacent stream. Condition 4.17.1 requires that proposed surface water diversions shall only be undertaken following consultation and agreement with the Agency and the Eastern Regional Fisheries Board. Schedule F: Emission limit values sets emission limit values for surface water emission to waters.

In relation to ground water, *Condition 9.6* requires an investigation into the potential sources of barium and actions if necessary to be taken in light of the findings of an investigation. *Condition 4.11.2* requires an examination of the current on site wastewater treatment system and if the examination indicates that it does not satisfy the requirements of SR6 then a replacement system is to be installed.

Various measures are conditioned to protect and monitor groundwater. *Condition 5.1 and 5.2* restricts the waste acceptance to inert materials. *Condition 9.1* requires the ongoing monitoring of all on site boreholes and *Condition 9.4* requires monitoring of all private drinking water supplies within 500 m of the facility subject to the agreement of the well owners. *Condition 10.6* provides for actions in the event that groundwater monitoring indicates that the facility is having a significant adverse impact on adjacent private wells. *Condition 4.12* requires that all fuels/oils be stored in a bunded area.

Therefore, the Technical Committee proposes no change to the PD.

## Recommendation

No Change.		

## Ground 2

The Dublin Mountain Conservation & Environmental Group feel that the conditions laid down are fine on paper but unworkable in reality as it would require daily monitoring by the EPA and they believe that this would not be possible.

## Technical Committee's evaluation

The Technical Committee considers that the PD requires substantial monitoring to be carried out by the licensee, including requirements for the monitoring of surface water, groundwater, noise, landfill gas and dust. All results, reports and proposals must be submitted to the Agency for assessment. In addition, an Environmental Report (AER) giving an overall picture of environmental performance at the facility must be submitted to the Agency annually.

In order to verify monitoring reports submitted by the licensee and to assess compliance with the conditions of the Waste Licence, the Agency will carry out unannounced site inspections, monitoring visits and audits of the licensee's facility. Therefore, the Technical Committee recommends no change to the PD.

## Recommendation

No Change.

## Ground 3

*The Dublin Mountain Conservation & Environmental Group believe that the development would be in breach of Council Directive 98/83/EC.* 

## Technical Committee's evaluation

The Technical Committee notes that Council Directive 98/83/EC of 3<sup>rd</sup> November 1998 relates to the Quality of Water intended for Human Consumption. The Technical Committee considers that the controls incorporated in the PD are adequate to ensure that activity will not cause significant environmental pollution of surface water or groundwater, as outlined in response to ground 1 above. As such the requirements of the Directive will not be contravened and therefore the Technical Committee recommends no change to the PD in this regard.

#### Recommendation

Southern Excavations Ltd.

# Ground 4

The D.M.C & E.G. feel that the lining system proposed is inadequate and would not prevent pollution reaching the groundwater. They state that this site has a very high water table and is extremely susceptible to pollution.

## Technical Committee's evaluation

Refer to the Technical Committee's evaluation of Ground 2 of the Southern Excavations Ltd. Objection.

## Recommendation

See Technical Committee's Recommendation for Ground 2 of Objection 1 - SEL Objection.

## Ground 5

This objection states that as pointed out in previous submissions, that a comprehensive study of both the hydrogeology and geology was required and that this has not been carried out.

## Technical Committee's evaluation

The Technical Committee notes that a Hydrogeological Assessment of the site was carried out and is included as an Attachment to the EIS – Section C – Existing Environment – Report No: K802-H. The Technical Committee considers that the controls and requirements for monitoring incorporated in the PD are adequate for the protection of groundwater. Therefore, the Technical Committee recommends no change to the PD in this regard.

## Recommendation

No Change.

## Grounds 6 and 7

The D.M.C & E.G. states that the EPA will not be able to adequately monitor this development and evidence from the 1998 report on IPC Licences indicates that many companies are not audited and that the EPA are highly dependent on the public to monitor these companies. Complaints made in 1998 have increased by 185% over 1997. The D.M.C & E.G. include page 46 from IPC Licensing & Control Report, 1998 listing the most common non-compliance's; document control, procedures, reports and results, monitoring, non-notification, bunding, waste management and ELV Exceedances. They point out that Southern Excavations Ltd. have had a history of non-compliance with regard planning and environmental issues since they began at this site.

# Technical Committee's evaluation

Please refer to the Technical Committee's evaluation and recommendations in relation to Ground 2 of the D.M.C & E.G. objection. In addition, the Technical Committee considers that the IPC

Licensing and Control Report, referred to in the objection, demonstrates the Agency's commitment of monitoring and auditing of compliance with Licence conditions and emission limit values to ensure that significant environmental pollution is not caused.

#### Recommendation

#### No Change.

## Ground 8

The D.M.C & E.G. states that no effective control is being offered by the EPA with regards to the type and quantity of waste entering this site as SEL would be monitoring its own operation. They list materials involved in building and demolition wastes; clay, brick, blocks, timber, aluminium, plastics, glass, plaster & plasterboard, paint tins, cement, fibre glass, bitumen products, concrete, steel, electrical wiring, asbestos, chipboard and chemicals are to name but a few.

## Technical Committee's evaluation

The Technical Committee notes that the licensee is limited to the disposal of inert waste types only, by the Conditions in the PD. The Technical Committee is satisfied that the requirements of the PD adequately control the types and quantities of waste to be accepted at this facility. The controls relating to the types of waste to be accepted have been outlined in the Technical Committee's evaluation of Ground 2 of the Southern Excavations Ltd. objection. In addition, the quantity of wastes to be accepted is limited to 200,000 tonnes per annum by Condition 5.4 and Schedule G.1. The licensee is required by Conditions 3.10 and 3.11 to maintain written records of all waste accepted at the facility and to provide information on same to the Agency. Refer also to the Technical Committee's evaluation to monitoring. In the interest of clarity, the Technical Committee recommends deleting the word "comprehensive" as it is confusing. This word is also defined under waste acceptance criteria Schedule G. In addition, it is recommended to correct a number of errors as outlined below.

## Recommendation

## Amend Condition 5.3.2 by deleting the word "Comprehensive":

The licensee shall undertake an assessment of all wastes to be disposed of in the landfill. **This** assessment shall include at a minimum the items outlined in Schedule G.3. Waste disposal at the facility shall only be permitted if the assessment satisfies the criteria set out in Schedule G.

## Schedule G: Waste Acceptance:

## G.3 Acceptance Criteria

Amend Level 3: On-site verification – Replace the words "the" with the word "any" in the sentence "…subjected to compliance testing and that which is described in the any accompanying documents."

Amend Point 1. under comprehensive assessment deleting the figure "7,5000" and inserting the figure "7,500".

## General Comment

The D.M.C & E.G. conclude by stating that the EPA would not be able to adequately monitor this development and given the non-compliance record of SEL with regard to planning and environmental law, this licence must now be revoked.

#### Technical Committee's evaluation

Refer to the Technical Committee's evaluation and recommendation in response to Ground 2 of this objection in relation to monitoring.

## <u>Submission on Objection by Southern Excavations Ltd. from Dublin Mountain</u> <u>Conservation and Environmental Group (received 03/10/00)</u>

Mr. Michael McCoy for and on behalf of Dublin Mountain Conservation & Environmental Group makes four arguments with regard the content of the Southern Excavations Ltd. Objection to the Proposed Decision. These arguments are addressed as follows:

#### Argument 1 & 2 – Condition 4.12.1

D.M.C & E.G state that in their opinion the conditions laid down by the Agency are the minimum for environmental protection and there should be no dilution or omission of any of these conditions with the exception of 4-12-1 page 12 E.P.A WLPD 84/1. D.M.C & E.G also state that they would like to draw attention to page 26 of the EIS Volume 1 which states that only hydraulic and engine oil are to be stored and that the storage of fuel is to be discontinued. This is contrary to condition 4-12-1 of the licence.

#### Condition 4.12.1

Prior to any fuel/oil being stored on site the licensee shall provide and maintain a bunded fuel storage area at the facility. The location of the fuel storage area shall be as shown on Drawing No. D.1.1 Rev. 1. unless otherwise agreed with the Agency. Fuels/oil shall only be stored at the agreed location.

#### Technical Committee's evaluation

The Technical Committee considers that in the event that the company should decide to store fuel oil at the facility, it is necessary that environmental controls are in place to ensure that the risk of environmental pollution is minimised. Therefore, the Technical Committee proposes no change to Condition 4.12.1.

#### Recommendation

No Change.

## Argument 3 – Condition 5.7

D.M.C & E.G state that there should be no extension of opening hours at this site and refer to Bord Na Mona EIS Volume 1 page 14 which clearly states the hours of opening.

**Condition 5.7** 

Southern Excavations Ltd.

Waste shall only be accepted at the facility between the hours below unless otherwise agreed in advance with the Agency. Wastes shall not be accepted on bank holidays.

## March to October

between the hours of 0800 to 1800 Monday to Friday inclusive and 0800 to 1430 on Saturdays and

## November to February

between the hours of 0800 to 1700 Monday to Friday inclusive and 0800 to 1430 on Saturdays.

## **Technical Committee's Evaluation**

Refer to the Technical Committee's evaluation and recommendation in response to Ground 3 of the Objection 1 – Southern Excavation Ltd's objection.

## Argument 4:

*D.M.C* & *E.G* state that the annual contribution of £14,382 would be totally inadequate for full monitoring of this licence and request that the figure be substantially increased.

## **Technical Committee's Evaluation**

Refer to the Technical Committee's evaluation and recommendation in response to Ground 5 of Objection 1 – Southern Excavation Ltd's objection.

Signed:

Breege Rooney Technical Committee Chairperson