## AN BINSE LUACHÁLA

## **VALUATION TRIBUNAL**

## AN tACHT LUACHÁLA, 1988

## **VALUATION ACT, 1988**

Intel (Ireland) Limited APPELLANT

and

#### **Commissioner of Valuation**

RESPONDENT

RE: Factory, offices and grounds at Map Ref: Part 1 (part of), Townland: Collinstown, E.D. Leixlip, R.D. Celbridge I, Co. Kildare

Quantum - Contractor's basis of valuation

BEFORE

Henry Abbott S.C. Chairman

Paul Butler S.C.

Brian O'Farrell Valuer

# JUDGMENT OF THE VALUATION TRIBUNAL ISSUED ON THE 20TH DAY OF SEPTEMBER, 1995

By Notice of Appeal dated the 28th day of October 1994 the appellant appealed against the determination of the Commissioner of Valuation in fixing a rateable valuation of £28,260 on the above described hereditament.

The grounds of appeal as set out in the Notice of Appeal are that:"The assessment is:

- (1) Excessive and inequitable having regard to the provisions of the Valuation Acts generally.
- (2) The valuation has been determined contrary to the provisions of the Valuation Acts in particular Section 11 Valuation (Ireland) Act 1852 as amended by Section 5 Valuation Act 1986.
- (3) The assessment is contrary to provisions of Section 7 of the Valuation (Ireland) Act 1860 as amended by Section 8 of the Valuation Act 1986.

- (4) The assessment was made and the procedures leading thereto were conducted contrary to the provisions of the Valuation Act and Code.
- (5) The determination of the Commissioner of Valuation at first appeal is null and void and contrary to the provisions of the Valuation Acts and Code and contrary to the provisions of natural and/or constitutional justice:
  - (a) the appellant was given no adequate opportunity of making representations or submissions to the appeal valuer.
  - (b) the appeal valuer carried out no independent assessment of the hereditament.
  - (c) notwithstanding agreement on the part of the appeal valuer to postpone consideration of the appeal and the making of his report until after the 3rd October, 1994 (and until such time thereafter as the appellant had been given a reasonable opportunity of making submissions) the appeal valuer, without prior warning to the appellant, and before receipt of submissions aforesaid issued a report on or before the 3rd October, 1994 and the Commissioner of Valuation purported to determine the appeal as of October, 1994."

## **The Property:**

The property comprises the European manufacturing base of the Intel Corporation which has its headquarters in Santa Clara, California.

The complex has been developed in two stages, the first stage referred to as the ESSM building and the second stage referred to as the Fab 10 complex.

The work being carried out in the ESSM building mainly involves the assembly and insertion of printed circuits into personal computers, and also some warehousing/storage.

The Fab 10 facility includes the main production building, the support building, the offices, warehouse, chemical store, water treatment or RODI buildings, energy centre, and waste neutralisation buildings. The process involves converting raw silicone which is imported from Germany and Japan, into microchips for the computer industry.

The Clean Room or Fab Block is essentially a three level structure, comprising a basement called the Subfab, a stiff vibration resistant suspended slab called the waffle slab and an elevated steel framework with a grated platform which supports the PACE units.

3

The waffle slab which supports the Clean Room floor is a unique development in that it is structurally independent of the steel frame of the building shell. This means that any movement or vibration in the shell of the building will not be transmitted to the production floor on which stands the very sensitive microchip producing machinery. The slab is 930 mm deep with about 400 support columns about 5 metres tall and this slab in turn is covered by a raised metal floor which facilitates air re-circulation. The Clean Room is laid out on the raised floor in alternate clean bays and service bays.

The clean bays are rated Class 1 which is the highest standard achievable in the world, and a higher standard than any other factory in Ireland. The remainder of the Fab space between waffle slab and roof, which acts as a plenum for the re-circulating air and make-up air, is rated class 100. Temperature in the Clean Room space is maintained at 22°C +- 1.5° and relative humidity is similarly maintained at 37% +- 2.5%.

The plant, because it is highly mechanised and automated, has significant demand for electrical power with an estimated peak demand of 18MVA and an average demand at full production of 12MVA. 25MW 110KV supply has been provided to the site by two overhead transmission lines from the ESB 110KJ network. This is one of only two industrial facilities in the country which has a supply at such a wattage. Site distribution is by 10KV underground cables.

#### **Location:**

The property is located on a 180 acre site about 1 mile from the village of Leixlip on the main road to Maynooth.

## **Agreed areas - Fab 10:**

Offices - GF 61,333 ft<sup>2</sup>
- 1F 57,560 ft<sup>2</sup>

Main Fab - GF 85,757 ft<sup>2</sup>

North Fab - GF	35,2	.74 ft <sup>2</sup>
Main Fab Interstitial	88,2	86 ft <sup>2</sup>
Main Sub Fab	87,4	79 ft <sup>2</sup>
North Sub Fab	38,417 ft <sup>2</sup>	
North Fab Interstitial	35,9	52 ft <sup>2</sup>
Made-Up Air Intake	15,4	50 ft <sup>2</sup>
Scrubbed Exhausts	15,4	50 ft <sup>2</sup>
Duct Shaft & Stairs	2,4	76 ft <sup>2</sup>
Office Block Penthou	se 14,4	08 ft <sup>2</sup>
Gas Pad	4,4	63 ft <sup>2</sup>

## **Ancillary Buildings:**

Warehouse	$26,058 \text{ ft}^2$
Chemical Store	12,514 ft <sup>2</sup>
Water Treatment (RODI)	15,718 ft <sup>2</sup>
Acid Waste Neutraliser	10,115 ft <sup>2</sup>
Energy Centre	$22,850 \text{ ft}^2$
Nitrogen Purifier	2,497 ft <sup>2</sup>
Link Building	5,000 ft <sup>2</sup>
Pumphouse	1,270 ft <sup>2</sup>

## **Boilers**

## **Energy Centre:**

1 No BO	19E 1-1	10,000,000 BTV/Lr
3 No BO	19E 1-3,4,6	16,700,000 BTV/Lr
1 No BO	19D 1-5	16,700,000 BTV/Lr

## **Generators:**

EG1 - 200 kW EG2 - 750 kW EG3 - 1800 kW EG4 - 1800 kW

## **Chillers:**

CH - 16E 2-4 - 3500 kW

CH - 16E 2-5 - 3500 kW

CH - 16E 2-6 - 3500 kW

CH - 16E 2-7 - 3500 kW

CH - 17E 6-1 - 2800 kW

CH - 17E 6-2 - 2800 kW

## Tanks:

Water Storage - 2 No x 75,000 gals

Liquid Nitrogen - 2 No

Nitrogen Bulk Tank - 1 No

Argon Silo - 1 No

D.I. Water Tank - 2 No

Sulphuric Acid Tank - 1 No

## **Acid Treatment:**

Water Neutralisation Tanks - 3 No x 25,000 gals

Solvent Tanks - 3 No

HF Acid Tank - 3 No

Water Regen Tank - 1 No x 15,000 gals

Lime Silo - 1 No

#### **Diesel Tank:**

1 No x 40,000 litres

#### **Tenure:**

Leasehold under a sale and leaseback arrangement with Irish Permanent Finance Limited. The lease is held for 35 years from 13th January 1993.

#### **Valuation History:**

The first phase of the development known as the ESSM building, was revised at 1991 Revision, and the valuation was fixed at £7,000. This valuation was subsequently reduced to £3,260 on First Appeal.

The premises was listed for Revision in 1992 to value the extension and the valuation was increased to £28,260. The valuation was appealed. No change to the valuation was made at First Appeal.

## **Written Submissions:**

A written submission was received from the appellant and the respondent respectively on the 15th day of March 1995 and on the 24th day of March 1995.

In the respondent's submission Mr. Tom Cuddihy, B.Agr.Sc, a District Valuer with 27 years experience with the Valuation Office, on the figures then available to him took three approaches to valuation of the premises. The first such approach was to take the rent under the "sale and leaseback" arrangement, with additional rateable expenditure added in, at a 7% de-capitalisation rate with adjustments back to November 1988. This resulted in an estimated rateable valuation of £32,000.

The second method was to take the sale price of the building and add improvements from the Fab 10 Building Cost Schedule. This gave a rounded rateable valuation on the same assumptions of £30,000.

The third method was from the Assets Schedule supplied to the respondent by the appellant and this gave an estimated rateable valuation of £30,942.

Mr. Raymond Ward, FRICS MIAVI ACI Arb, Chartered Surveyor of Lisney submitted in his précis of evidence that:

a) certain parts of the subject were not rateable in so far as they related to plant involved in the process of manufacture and that the premises ought to be valued on a square footage basis together with a measurement of the absolute values for tanks, boilers, pipework and motive power. His valuation was estimated at £15,440.

He set out a number of comparisons, the principle of which is **Intel (Ireland) Limited** 1991/4 appeal rateable valuation £3,260 (the ESSM building).

#### **Oral Hearing:**

The oral hearing commenced on the 27th day of March 1995. Hugh O'Neill, Senior Counsel instructed by Arthur Cox, Solicitors appeared for the appellant and Aindrias O'Caoimh, Senior Counsel instructed by the Chief State Solicitor appeared for the respondent. Mr. John McGowan, Engineer, Head of Facilities at Intel and formerly of consultants managing the construction of the premises gave evidence. His evidence indicated clearly that the subject building was special. He set out in detail the manner in which clean air was inducted and refreshed in the premises in addition to the supply of specialised scrubbing gases and deionised water to provide an exceptionally clean environment. He also instanced the impact of changes of temperature on the production process. Mr. McGowan described in evidence the ESSM building which had been built on the same site as the subject in Leixlip but had already been valued. This building had been used for the assembly of computer components, warehousing and storage and other miscellaneous uses, but under no circumstances was it as sophisticated as the subject.

The Tribunal adjourned for the purpose of inspecting the subject premises, and this inspection took place on the 11th day of April 1995.

The hearing resumed on the 22nd day of May 1995 at which time the appellant was in a position to furnish to the Tribunal revised tables of costs showing items which had been agreed between the parties to be rateable, non rateable and other items which were disputed in relation to their rateability. Also the appellant was able to point out that Mr. Cuddihy in his estimation of the cost of construction for the capital cost method of valuation had in fact double counted in arriving at his figure to the extent of £18,644,523. Mr. Cuddihy also had carried out further exercises in relation to figures produced by Mr. David Cunningham, Site Group Cost Manager, Intel and the final day of the hearing concentrated on the rateability issues and on the correct rate of return for use in the capital cost depreciation method of valuation.

Considerable debate ensued in relation to the use of the ESSM building and valuation for the purpose of deducing an appropriate rate of return on capital. Mr. Ward's estimation of 4.2% return on capital was challenged by an exercise carried out by Mr. Cuddihy which resulted in reduction of some of the costs of construction of the ESSM project causing the rate of return to increase to 7%. Mr. McGowan also highlighted the de-mountable nature of the clean room and other process spaces, in addition to the fact that he did not regard the roof over the clean room under the interstitial space and holding the pace units, as floor area properly so called as it was so thoroughly adjustable by removable components. The concluding submissions of Mr. O'Neill may be summarised as follows:

- (1) The ESSM building did constitute a valid comparison as it was a building in which humidity and other parameters were closely controlled, perhaps not to the same degree as the subject building in the cleaner parts, but along the same lines as the subject building in respect of large significant areas. In addition the office space was similar as was the ancillary equipment and space.
- (2) The contractor's method was not reliable.
- (3) Working back from the rateable valuation of £28,260 and applying a rate of return of 4.2% with 13% reduction for 1988 costs, a figure of £127.7m for capital costs resulted. This interestingly coincided just between the two figures for costs of construction initially supplied by the appellant to the Commissioner of Valuation.

(4) Items such as a clean room and the other items set out later in this judgement by reason of the de-mountability of the clean room structure, and the integral part being played in the production of clean air were more to do with the production process than parts of the hereditament properly so called, and were not rateable. He emphasised that rateability ultimately depended on the intention relating to the

affixing of property to the ground.

Mr. O'Caoimh in his submissions replied that the ESSM building was not an adequate comparison, that in the circumstances the only basis for valuation was the capital cost method and that 7% was the appropriate rate of return. He cited 'Armour on Valuation for Rating' fifth edition and 'Ryde on Rating and the Council Tax' current edition.

He referred to *Cement Limited v. Commissioner of Valuation* [1960] IR 283 and *Cork Grain Discharging Company Limited v. Commissioner of Valuation* [1978] IR 35, regarding rateability of Clean Room type structures.

In relation to the submissions made on the allegedly non-rateable items by the appellant, Mr. O'Caoimh submitted that the raised metal floor was part of the building and essential to it. In relation to chillers and other items controlling the air quality, he submitted that these are just the same as chillers in a cold store attached to a meat factory. He cited the decision \( \bar{VA88/0/056 & VA88/0/057 - Pfizer Chemical Corporation v. Commissioner of Valuation in relation to the rateability of the cooling tower. Mr. O'Neill replied that the cost of the subject was cheap and that it was effectively an air processing plant and that the treatment of air should be treated as a part of the manufacturing process and the equipment to do it should not be treated as rateable for that reason. He also asked the Tribunal to consider the valuation of Analog Devices Limited, Raheen Industrial Estate, Limerick which was a building perhaps closest (although inferior) to the subject.

## **Findings:**

## (a) Rateability:

On the basis of the list of disputed items submitted by the appellant the Tribunal finds that the clean air rooms are part of the building and are rateable notwithstanding that they consist of much de-mountable material which may be reassembled in different ways.

The reasons for the Tribunal's finding on this aspect are as follows:-

The Tribunal finds that notwithstanding the flexibility of the Clean Room, it is nevertheless an enclosed space standing in a floor with doors, windows and a ceiling which protects it from the outside environment, albeit an inside environment of artificially treated air (which is at a different level of treatment inside the Clean Room), and people may walk around freely inside these rooms in addition to performing their ordinary tasks. In making this finding the Tribunal has had regard to the following decisions - *Cork Grain Discharging Company Limited v. Commissioner of Valuation (1978) IR 35, Cement Limited v. Commissioner of Valuation (1960) IR 283*.

In regard to the other items which more or less go to service the Clean Room, the Tribunal is likewise of the opinion that they are parts of the building and are rateable except for the agreed item "process vacuum" which was for the purpose of lifting small items of material by way of vacuum capture. The cooling towers of which 30% are included are certainly rateable on the basis of VA88/0/057 - Pfizer Chemical Corporation v. Commissioner of Valuation.

### (b) Quantum:

The Tribunal is directed by the 1986 Act to consider all evidence of valuations of comparable premises in the vicinity of the subject which have been recently valued. The tribunal finds that the ESSM building while not sophisticated to the same degree as the subject is nevertheless comparable in many ways:

- (i) It is on the same site
- (ii) It is recently constructed
- (iii) It is dealing with the computer business
- (iv) The atmosphere is controlled in relation to humidity, temperature and other

## parameters to a fairly significant extent

#### (v) It is under the same management

The value of such a comparison is not so much as to give comparable square footage rates but to indicate a likely rate of return for capital in the immediate vicinity of the subject premises. The Tribunal considers that in the light of the concentration of the debate on the issues founded on the capital cost method this is an appropriate emphasis to put on this appeal having regard to the uniqueness of the subject premises.

Finally, the Tribunal has taken cognisance of Mr. Cuddihy's last calculation on construction costs based on David Cunningham's figures given on behalf of the appellant, but has taken out a figure in respect of "scrubbed exhausts" which Mr. Cuddihy inadvertently added to his calculation. While not accepting Mr. Cuddihy's 7% deduced from the adjusted construction costs of the ESSM building, the Tribunal is disposed (by reason of the fast moving nature of the computer industry, and the need for a reasonably high rate of return on capital on all assets), to consider that a figure approaching that suggested by Mr. Cuddihy would be appropriate. The fact that the ESSM building was of a more conventional nature should mean that a longer period for repayment should be allowed to take into account better chances of renting the building for alternative uses.

The Tribunal has considered the difficult issue of "distributables" and has accepted Mr. Cuddihy's figures for distributables being added onto the figures with an adjustment back to 1988 of 8%. The forgoing exercise produces in view of all the circumstances, an NAV of almost £4m. On a rounded up basis and on the application of the ratio of 0.5% this results in a rateable valuation of £20,000 for the Fab 10 building. In addition, the existing valuation for the ESSM building of £3,260 should be added to give a total valuation for the subject of £23,260 and the Tribunal determines this latter figure to be the rateable valuation.