



TEST REPORT No : AT/03/13

DATE OF ISSUE : 26 March 2003

Page 1 of 16

**INTERNATIONAL STANDARD METHOD FOR
MEASUREMENT OF AIRBORNE SOUND
INSULATION OF BUILDING ELEMENTS
BS EN ISO 140-3 : 1995**

CLIENT: Jewers Doors Limited
Stratton Business Park
Biggleswade
Bedfordshire
SG18 8QB

JOB NUMBER: A03/08

TEST SAMPLE: Folding doors - various

MANUFACTURER: Jewers Doors Limited

DATE RECEIVED: 3 March 2003

DATE OF TEST: 3 – 6 March 2003

Signed: 

D J M^cCaul
Laboratory Manager

Approved: 

G Kerry
Technical Manager



THE QUEEN'S
ANNIVERSARY PRIZES
FOR HIGHER AND FURTHER EDUCATION

ISO 140-3:1995 Laboratory measurements of airborne sound insulation of building elements

Client	Jewers Doors Limited Stratton Business Park Biggleswade Bedfordshire						
Manufacturer Jewers Doors Test specimen mounted by: Client Product identification: Esavian bi-folding door							
Measurement procedure: ISO 140-3:1995	Test procedure: ISO 717-1:1996						
Mass per unit: 36.6 kg/m ²	Size: 8.64 m ²						
Temperature [°C]: 23.7	Humidity [%]: 47.6						
Test room identification: Small rev room / Large rev room Source room Volume: 112 m ³ Receiving room Volume: 225 m ³ Date of test: 04/03/03							
Weighted Sound reduction $R_w(C,C_{tr}) = 37 (-1; -2)$ dB							
Sum of unfavourable deviations: 30.7 dB							
Max. unfavourable deviation: 8.6 dB at 800 Hz							
$C_{50-3150}$: ---	$C_{50-5000}$: ---		$C_{100-5000}$: 0 dB				
$C_{tr50-3150}$: ---	$C_{tr50-5000}$: ---		$C_{tr100-5000}$: -2 dB				
Frequency	R	L1	L2	T	Corr.	u.Dev.	
[Hz]	[dB]	[dB]	[dB]	[s]	[dB]	[dB]	
100	25.8	83.6	60.6	7.90	2.8	--	
125	33.1	85.6	54.7	6.85	2.2	--	
160	37.5	85.3	49.5	6.15	1.7	--	
200	38.9	83.4	46.5	6.55	2.0	--	
250	38.9	81.6	44.1	5.75	1.4	--	
315	37.9	82.2	45.2	5.11	0.9	--	
400	37.2	82.7	46.6	5.31	1.1	--	
500	36.2	82.5	47.9	6.00	1.6	0.8	
630	33.1	83.0	51.7	6.29	1.8	4.9	
800	30.4	82.9	54.2	6.12	1.7	8.6	
1000	34.4	82.8	50.0	6.01	1.6	5.6	
1250	37.3	83.3	47.3	5.60	1.3	3.7	
1600	38.0	83.3	46.0	4.89	0.7	3.0	
2000	39.2	82.8	43.9	4.51	0.3	1.8	
2500	39.7	83.4	43.4	3.92	-0.3	1.3	
3150	40.0	83.1	42.1	3.28	-1.0	1.0	
4000	40.0	84.1	42.2	2.69	-1.9	--	
5000	39.4	83.2	40.9	2.14	-2.9	--	

University of Salford School of Acoustics and Electronic Engineering

No. of test reference: TL/03/03/01

Salford, 4.03.2003

Sound Insulation ISO 717 (1982)

Client: Jewers Doors Limited, Stratton Business Park

Test specimen mounted by: Client

Description of the specimen:

Esavian bi-folding door.

Composition: 70mm RW4 filler

2mm galve cladding

Product identification: Esavian bi-folding door

Test room identification: Small rev room / Large rev room

Date of test: 04/03/03

Size: 8.64 m²

Mass per unit: 36.6 kg/m²

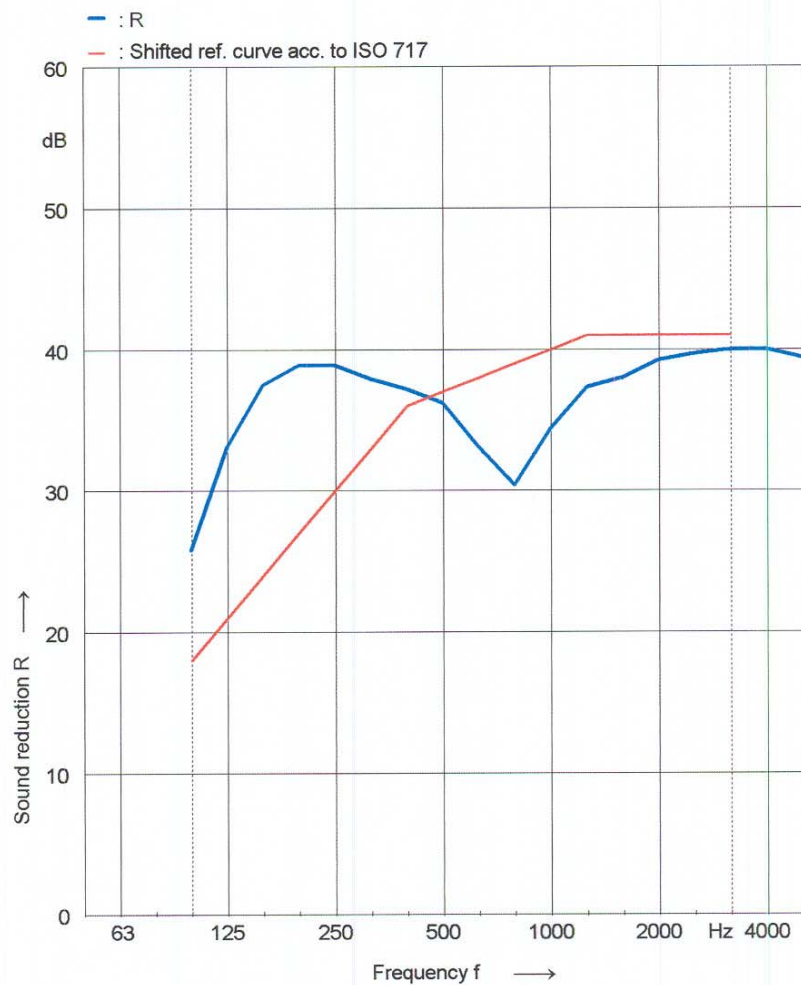
Temperature [°C]: 23.7

Humidity [%]: 47.6

Source room Volume: 112 m³

Receiving room Volume: 225 m³

Frequency [Hz]	R 1/3 oct. [dB]
50	--
63	--
80	--
100	25.8
125	33.1
160	37.5
200	38.9
250	38.9
315	37.9
400	37.2
500	36.2
630	33.1
800	30.4
1000	34.4
1250	37.3
1600	38.0
2000	39.2
2500	39.7
3150	40.0
4000	40.0
5000	39.4



Rating according to ISO 717-1

$R_w(C, C_T) = 37 (-1; -2) \text{ dB}$

$C_{50-3150}$: ---

$C_{50-5000}$: ---

$C_{100-5000}$: 0 dB

$C_{T50-3150}$: ---

$C_{T50-5000}$: ---

$C_{T100-5000}$: -2 dB

Evaluation based on laboratory measurement results obtained by an engineering method

University of Salford School of Acoustics and Electronic Engineering

No. of test reference: TL/03/03/01

Salford, 4.03.2003

Signature: *Timothy*

No. OF SETS OF DOORS:
1 No. OFF AS DRAWN


EXTERNAL AND INTERNAL SHEETS TO
BE 2mm THICK GALVANISED STEEL
FINISH:
NATURAL

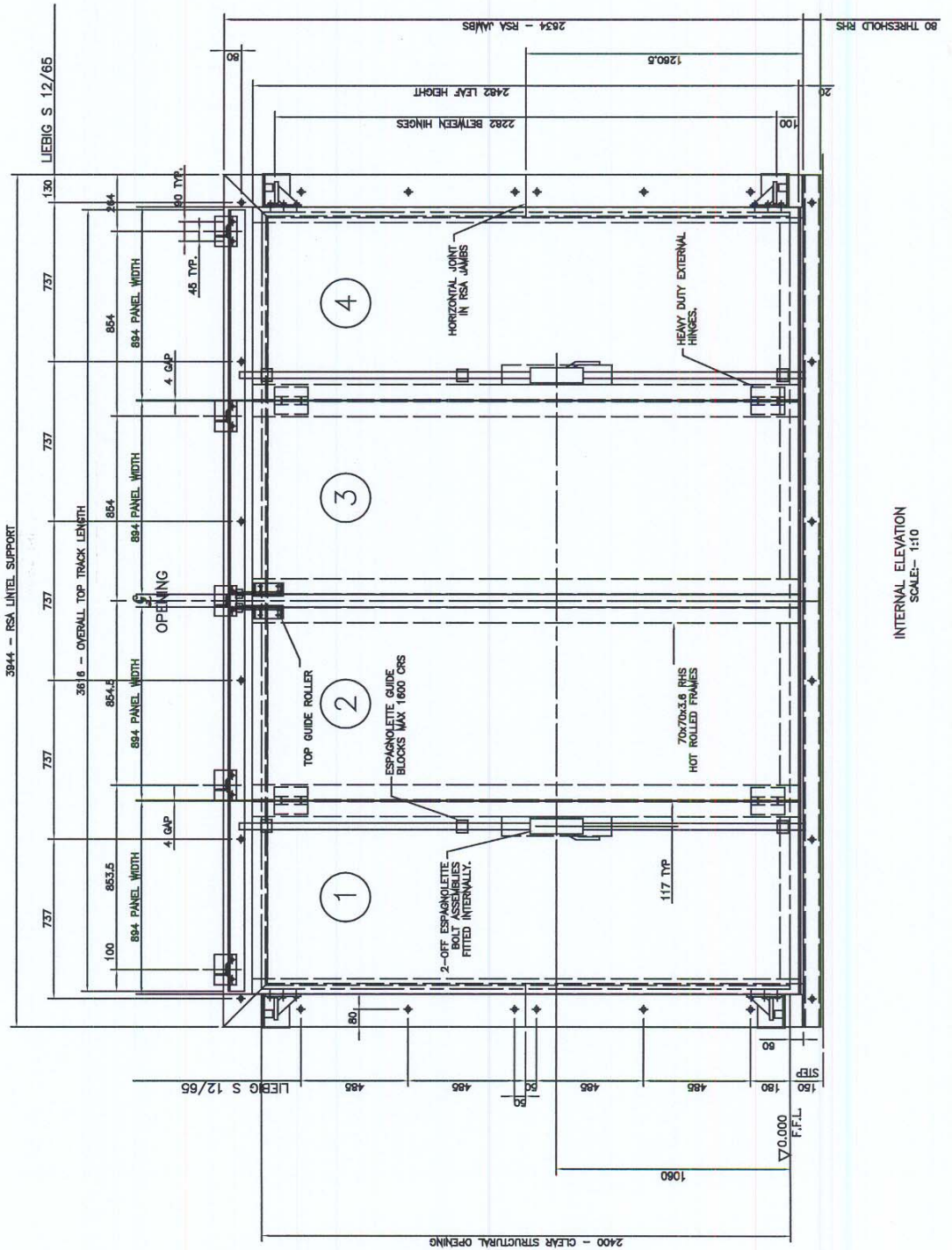
ALL TRIMS TO BE NATURAL FINISH
ALL HINGES AND FITTINGS TO
BE ZINC PLATED

WEIGHTS:-

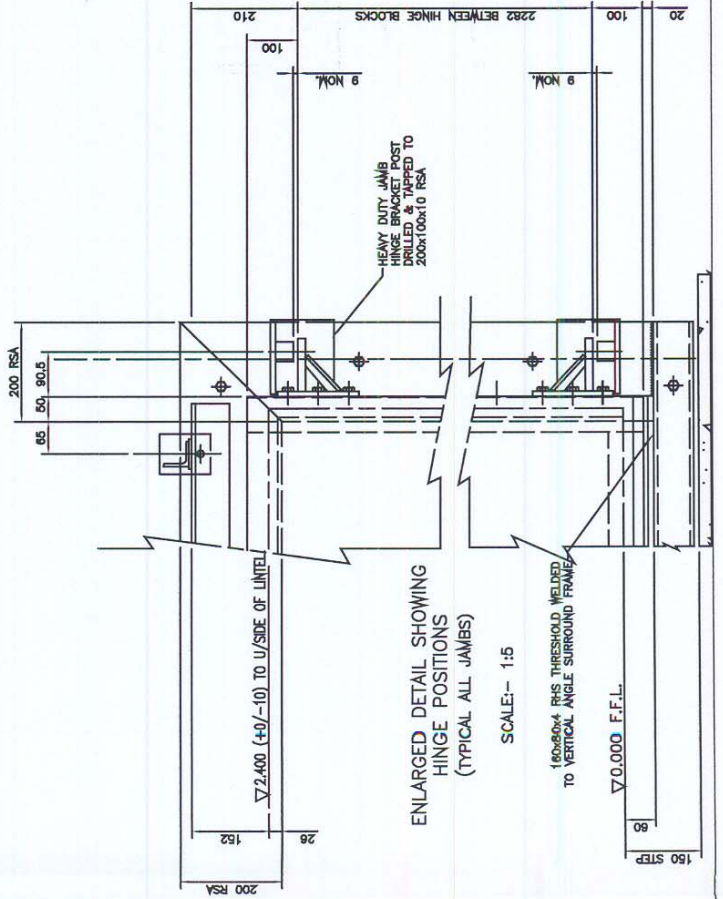
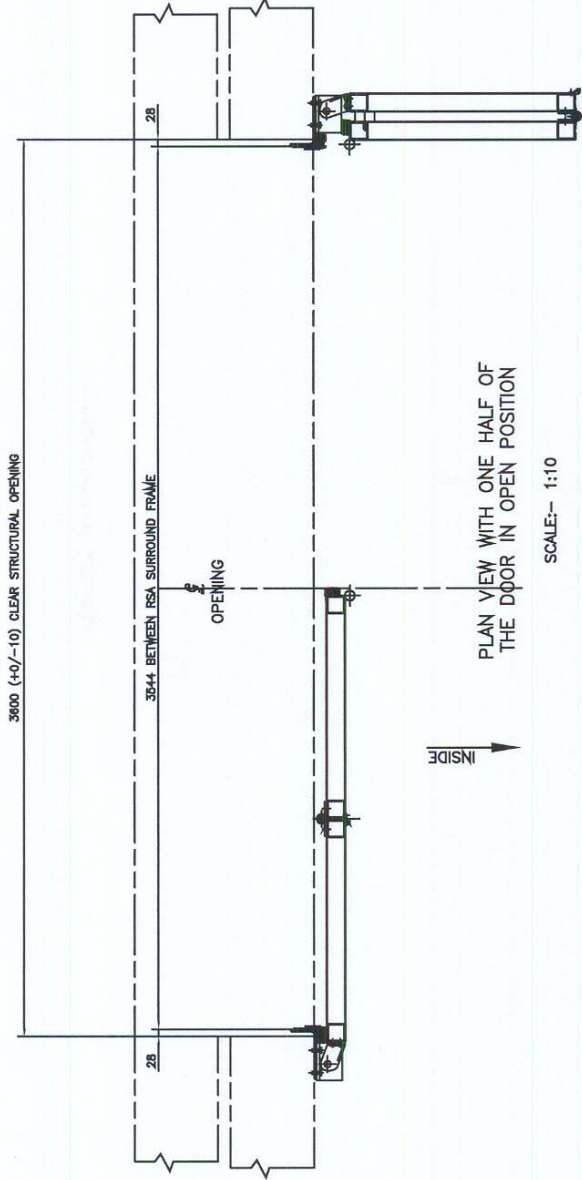
DOOR LEAF WEIGHT = ???Kgrms EACH.
TOP TRACK WEIGHT = ?? Kgms.

THIS DRAWING TO BE READ IN
CONJUNCTION WITH DRAWING No.
C6441-002, 003

B	25/07/06	ISSUE 1 TYPE 1B REVISION 10/07/06	FIRST ISSUE
A	1/06	ISSUED	APPROVED
<p>The Property of this Drawing Book and Design is owned by Esavian Doors Ltd. It must not be reproduced by any person without the prior written consent of Esavian Doors Ltd.</p>			
DESIGNER	S.P. JOURNAL	<p>Esavian Esavian Doors Ltd. Esavian Way, Unit 10, Esavian Industrial Estate, Esavian, Walsby, Lincolnshire, LN11 9JN Tel: 01522 810000 Fax: 01522 810001 www.esavian.co.uk</p>	
DATE	29/11/02	PROJECT REF	ACCOUSTIC BI-FOLD TEST DOOR SALFORD UNIVERSITY
SHEET SIZE	A1	DWG TITLE	INTERNAL ELEVATION OF BI-FOLDING ACOUSTIC DOORS (2400 WIDE 2400 HIGH)
		DRAWING NUMBER	C6441-001



INTERNAL ELEVATION
SCALE: 1:10

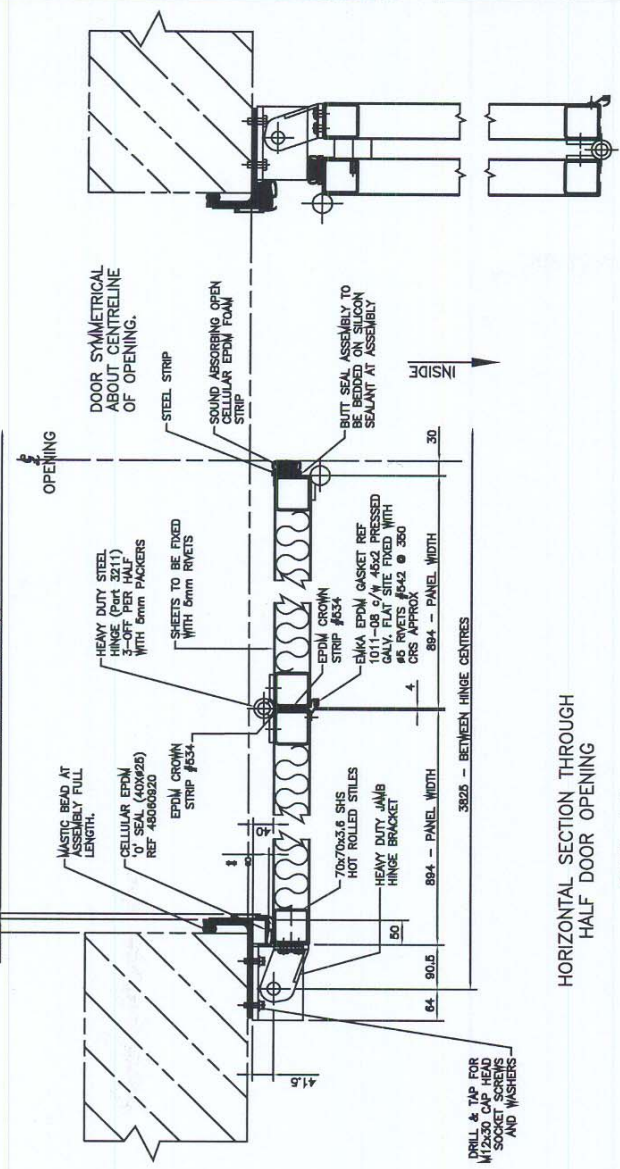


THIS DRAWING TO BE READ IN CONJUNCTION WITH DRAWING No. C6441-001, 003

DATE	DESCRIPTION	BY	CHKD	REVISION
28/11/02	REVISED	S.P. JACOBI	UNIVERSITY	FIRST ISSUE

<p>Esavian</p> <p>Esavian Doors Ltd Unit 10, Esavian Way Broomfield, Essex, UK Tel: +44 (0) 1707 277000 Fax: +44 (0) 1707 277001 Email: sales@esavian.co.uk</p>		<p>PROJECT REF</p> <p>ACOUSTIC BI-FOLD TEST DOOR SALFORD UNIVERSITY</p>
<p>DWG TITLE</p> <p>PLAN VIEW OF BI-FOLDING ACOUSTIC DOORS (3600 WIDE 2400 HIGH)</p>		<p>DRAWING NUMBER</p> <p>C6441-002</p>

3600(+/-10) CLEAR STRUCTURAL OPENING
 3544 - CLEAR BETWEEN RSA JAMB POSTS
 3521 - CLEAR OPENING



HORIZONTAL SECTION THROUGH HALF DOOR OPENING
 SCALE:- 1:5

THIS DRAWING TO BE READ IN CONJUNCTION WITH DRAWING No. C6441-001, 002

REVISED	DATE	BY	REASON
A	1/12		ISSUED

PROJECT REF: ACCUSTIC BI-FOLD TEST DOOR SALFORD UNIVERSITY

DWG TITLE: VERTICAL SECTION THROUGH DOOR OPENING (SEE FIG. 3401 HERE)

DWG NO: A1

SHEET SIZE: A1

DATE: 26/11/02

DRAWN: S.P. BOWEN

ESTIMATE NO: 1015

PROJECT NO: 1015

PROJECT REF: ACCUSTIC BI-FOLD TEST DOOR SALFORD UNIVERSITY

DWG TITLE: VERTICAL SECTION THROUGH DOOR OPENING (SEE FIG. 3401 HERE)

DWG NO: A1

SHEET SIZE: A1

DATE: 26/11/02

DRAWN: S.P. BOWEN

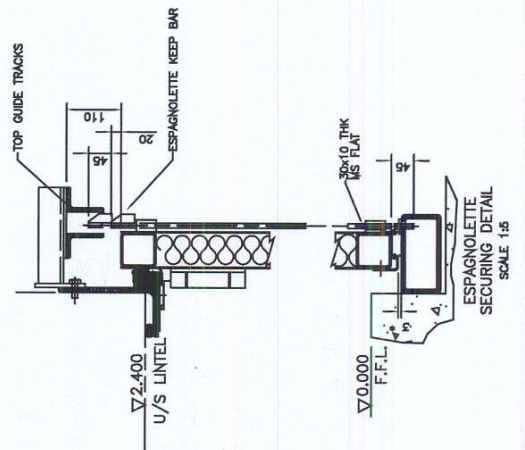
ESTIMATE NO: 1015

PROJECT NO: 1015

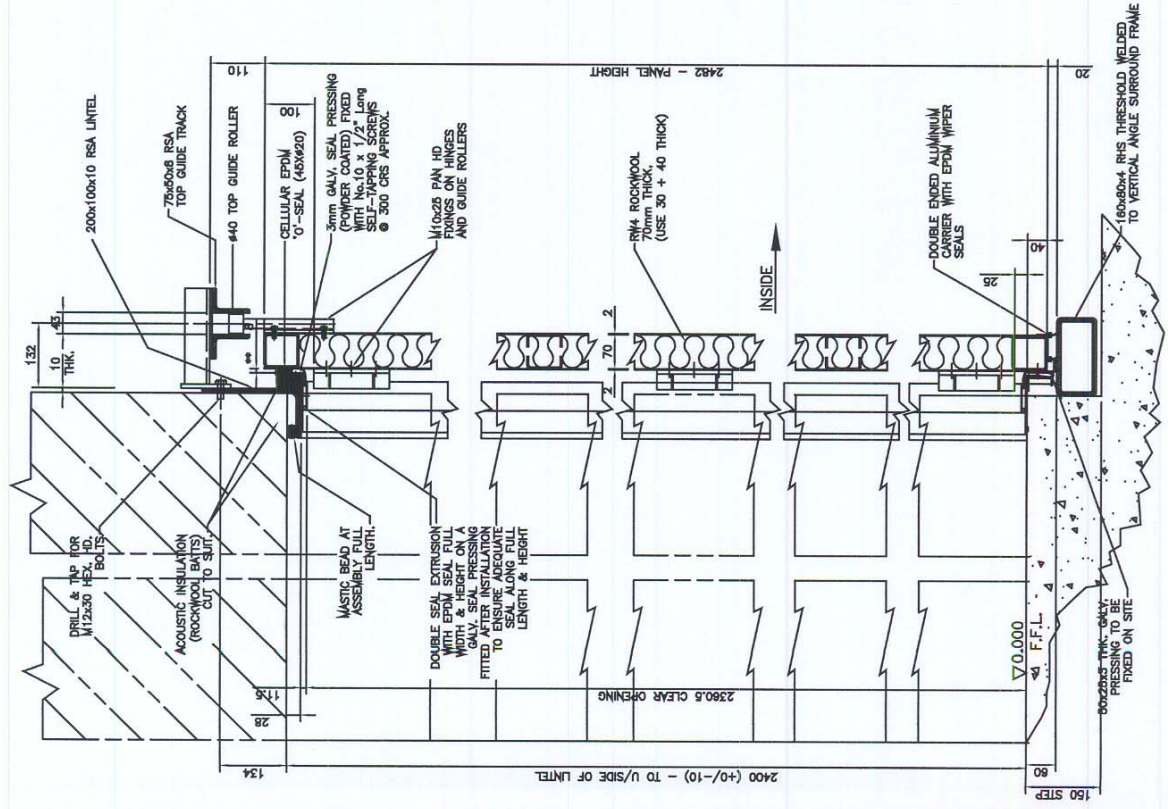
PROJECT REF: ACCUSTIC BI-FOLD TEST DOOR SALFORD UNIVERSITY

ERECTOR'S NOTES RE FITTING OF SEALS

- * BOTTOM SEAL PRESSINGS THIS DIMENSION TO BE MAINTAINED TO BE OBTAINED AFTER THE DOOR HAS BEEN ADJUSTED AND THRESHOLD FITTED
- ** JAMB & HEAD SEAL PRESSINGS THIS DIMENSION TO BE MAINTAINED TO BE OBTAINED AFTER THE DOOR LEAVES HAVE BEEN FITTED, IN ACCORDANCE WITH DRAWING No. C6441-104



VERTICAL SECTION THROUGH DOOR OPENING
 SCALE:- 1:5



VERTICAL SECTION THROUGH DOOR OPENING
 SCALE:- 1:5