

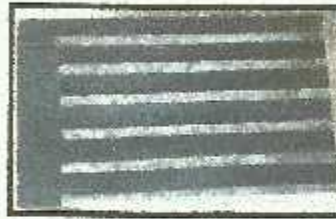


COMPRESSION SET TEST REPORT

Report No : AT & TC/CST/189/2015
 Date : June 22, 2015
 Customer Name : National Engineering Services Pakistan (Pvt) Limited
 Customer's Reference : NESPAK/SA-300/AS-145
 Letter Dated : June 15, 2015
 Project Name : Construction of Canal Expressway from GATT Walla
 Bridge to Shaiawalla (M-3) Interchange, Paisalabad
 Part Name : Elastomeric Bearing Pad (400x500x69mm)
 Manufactured by : Interbuna Spain
 Quantity : 01 Sample



Bearing Pad Sample



Cross Section

TEST PARAMETERS:

Test Standard : ASTM-D395
 Temperature : 70°C
 Period of Test : 22 Hours.

TEST RESULTS:

Description	Observed	Specified	Remarks
Compression Set	15.2%	25 % (Max)	Within limit

#10570



(Signature)
AKBER JAWED MIR
MANAGER (TECHNICAL)



The test results contained in this report pertain only to the sample submitted for testing and not necessarily to all similar products



OZONE AGING TEST REPORT

Report No : AT & TC/OZN /391/2015
Date : June 22, 2015
Customer Name : National Engineering Services Pakistan (Pvt) Limited
Customer's Reference : NESPAK/SA-300/AS-145
Letter Dated : June 15, 2015
Project Name : Construction of Canal Expressway from GATT Walla
Bridge to Shaiawalla (M-3) Interchange, Faisalabad
Part Name : Elastomeric Bearing Pad (400x500x69mm)
Manufactured by : Interbuna Spain
Quantity : 01 Sample



Bearing Pad



Tested Sample


TEST PARAMETERS:

Test Standard : ASTM-D1149
Temperature : 38°C ± 2 °C
Ozone Concentration : 100±5 PPHM
Elongation : 20%
Period of Test : 100 Hours.

TEST RESULTS:

- After completion of the test (100Hrs), No abnormalities such as discoloration and cracks have been observed.




AKBER JAWED MIR
MANAGER (TECHNICAL)



AT&TC

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TENSILE STRENGTH/ELONGATION & HARDNESS
TEST REPORT

Report No. : AT & TC/TSTR/ELOG/HRD-CHG-R /187/2015
Date : June 22, 2015
Customer Name : National Engineering Services Pakistan (Pvt) Limited
Customer's Reference. : NESPAK/SA-300/AS-145
Letter Dated : June 15, 2015
Project Name : Construction of Canal Expressway from GATT Walls
Bridge to Shaiawalla (M-3) Interchange, Faisalabad
Part Name : Elastomeric Bearing Pad (400x500x69mm)
Manufactured by : Interbuna Spain
Quantity : 01 Sample



Bearing Pad



Tested Dumbbell

TEST PARAMETERS:

Test Standard : ASTM D412 (Tensile Strength & Elongation)
Test Standard : ASTM D2240 (Hardness Shore A)

Original Properties

Description	Observed	Specified	Remarks
Hardness Shore A	62-63	60±5	Within the limit
Tensile Strength Kgf/cm ²	163	160 Min.	Within the limit
Elongation %	415	350 Min.	Within the limit

CHANGE IN PROPERTIES AFTER HEAT AGING

Heat Aging

Test Standard : ASTM D573
Temperature : 100°C
Period : 70Hrs.

Change in Properties

Description	Observed	Specified	Remarks
Hardness Point	+2	+10	Within the limit
Tensile Strength %	+6.8	±15	Within the limit
Elongation %	-18	-50	Within the limit



Akber Jawed Mir

**AKBER JAWED MIR
MANAGER (TECHNICAL)**



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TEAR STRENGTH TEST REPORT

Report No : AT & TC/FSIR/190/2015
Date : June 22, 2015
Customer Name : National Engineering Services Pakistan (Pvt) Limited
Customer's Reference : NESPAK/SA-300/AS-145
Letter Dated : June 15, 2015
Project Name : Construction of Canal Expressway from GATT Walla
Bridge to Shaiawalla (M-3) Interchange, Faisalabad
Part Name : Elastomeric Bearing Pad (400x500x69mm)
Manufactured by : Interbuna Spain



Bearing Pad



Tested Sample

TEST PARAMETERS:

Test Standard : ASTM D 624

TEST RESULTS:

Description	Observed Kgs/cm ²	Specified Kgs/cm ²	Remarks
Tear Strength	53.6	13 (Min)	Within Limit




AKBER JAWED MIR
MANAGER (TECHNICAL)



AT & TC

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LOW TEMPERATURE TEST REPORT

Report No. : AT & TC/LTR/208/2015
Date : June 22, 2015
Customer Name : National Engineering Services Pakistan (Pvt) Limited
Customer's Reference : NFSPAK/SA-300/AS-145
Letter Dated : June 15, 2015
Project Name : Construction of Canal Expressway from GATT Walla
Bridge to Shaiawalla (M-3) Interchange, Faisalabad
Part Name : Elastomeric Bearing Pad (400x500x69mm)
Manufactured by : Interbuna Spain
Quantity : 01 Sample



Bearing Pad



Tested Sample


TEST PARAMETERS:

Test Standard : ASTM D 736
Temperature : -40 °C
Period of Test : 5 Hours.

TEST RESULT:

- After completion of the test (5 Hrs), No abnormalities such as cracks and break has been observed on the sample.




AKBER JAWED MIR
MANAGER (TECHNICAL)



AT & TC

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LOW TEMPERATURE STIFFNESS TEST REPORT

Report No : AT & TC/LTR/210/2015
 Date : June 22, 2015
 Customer Name : National Engineering Services Pakistan (Pvt) Limited
 Customer's Reference : NESPAK/SA-300/AS-145
 Letter Dated : June 15, 2015
 Project Name : Construction of Canal Expressway from Gatt Walla Bridge to Shaiawalla (M-3) Interchange, Faisalabad
 Part Name : Elastomeric Bearing Pad (400x500x69mm)
 Manufactured by : Interbuna Spain
 Quantity : 01 Sample



Bearing Pad



Tested Dumbbell

TEST PARAMETERS:

Test Standard : ASTM D 797
 Temperature : Young Modulus at 35 °C

TEST RESULTS:

Description	Observed	Specified	Remarks
Stiffness	238 Kg/cm ²	350 Kg/cm ² (Max)	Within the limit

(Handwritten signature)

**AKBER JAWED MIR
 MANAGER (TECHNICAL)**



AT/01/

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