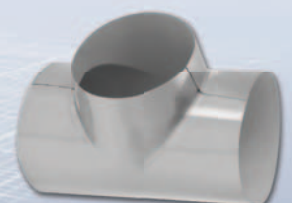
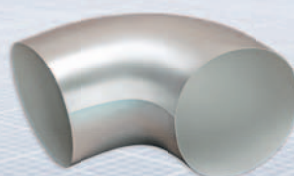
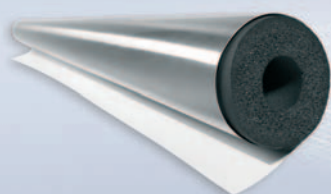


# Arma-Chek® Silver 350

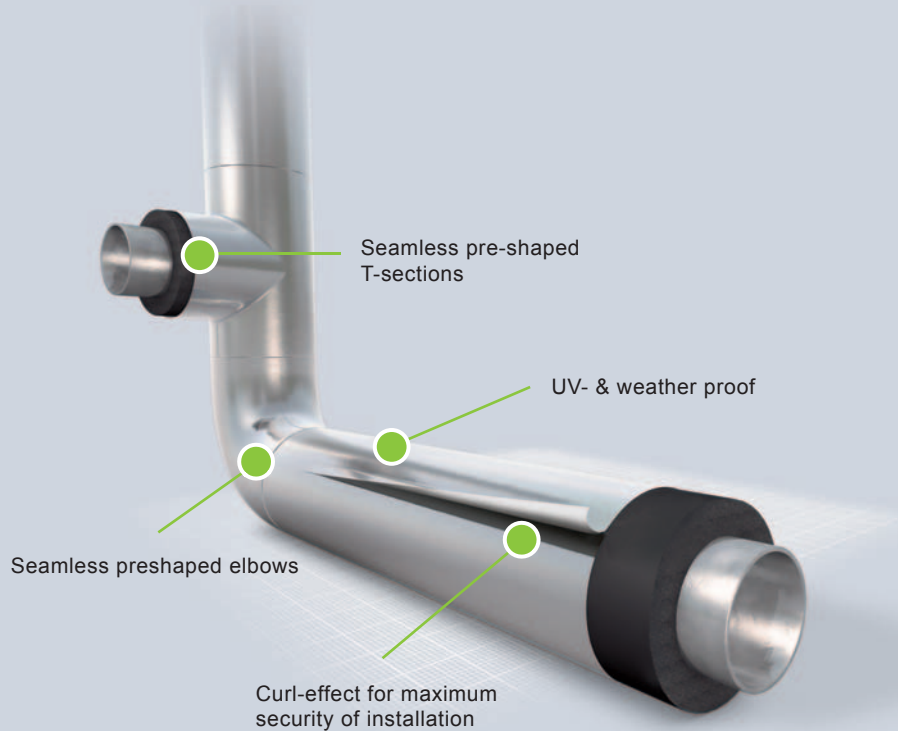


The professional covering system with excellent aesthetic appearance



# Arma-Chek® Silver 350

## ► New generation solution: durable, reliable and fast to install

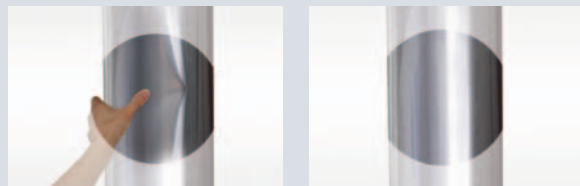


### Your benefits

Designed to provide mechanical and weather protection for Armaflex, Arma-Chek® Silver 350 provides an efficient and economical means to protect sheet and tube insulation. Arma-Chek® Silver 350 is a multi-layer laminate of aluminum, coated with special UV protection and a polymer backing. Arma-Chek® Silver 350 has high puncture and tear resistance, contains flame retardant, and can be used as an exterior facing on hot or cold insulation systems. This product also offers excellent water tightness and vapour-barrier performance.

## ► Significant advantages

- Faster to install than metal jacketing
- Prefabricated elbows, tees and end caps available
- Eliminates the need for shop fabrication
- Less skilled labour required than metal
- Easy and fast to cut
- Safe to use
- Easy and light to lift and carry
- No power tools required
- Jacketing can be cut on site using a portable cutting table
- Cost savings in labour, material and time
- High-performance silver joining tape available
- Polymeric cladding to avoid galvanic corrosion



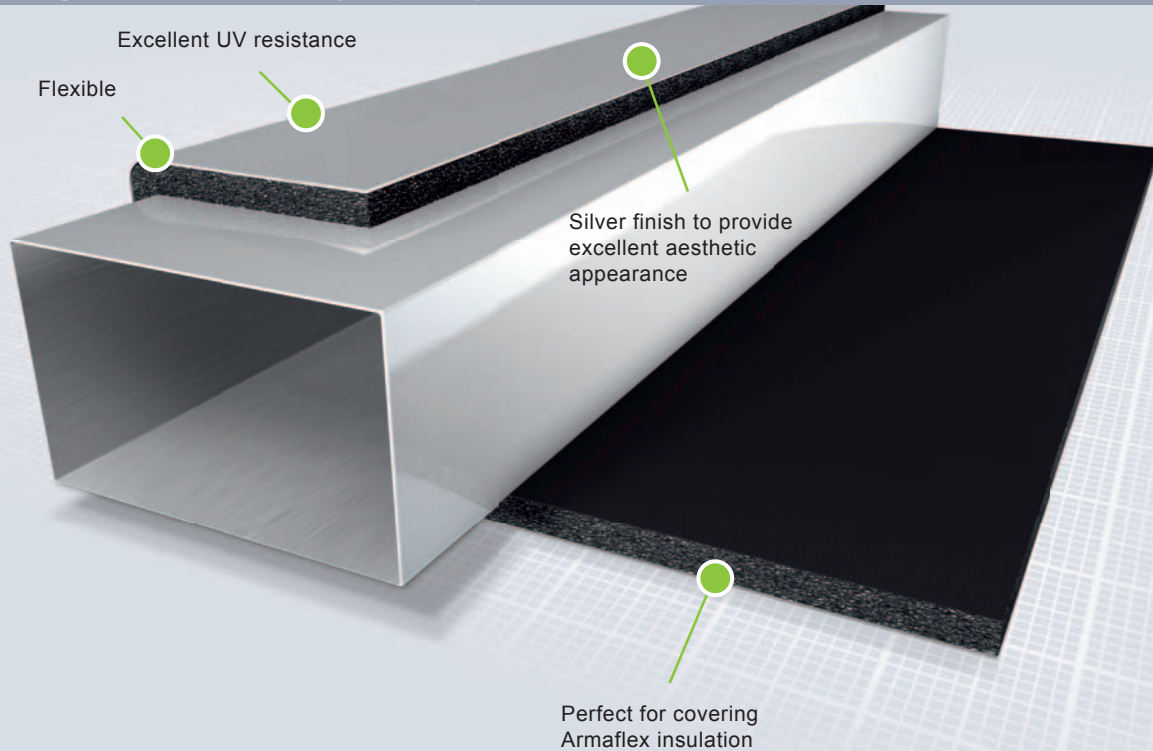
Arma-Chek® Silver 350 is highly resistant to deformation from impact. The elastic behavior of the material allows it to “bounce back” into its original shape, rather than being permanently deformed like metal jacketing.



Prefabricated shapes, such as end caps, make installation fast, easy and give a professional finish.

# Arma-Chek® Silver 350

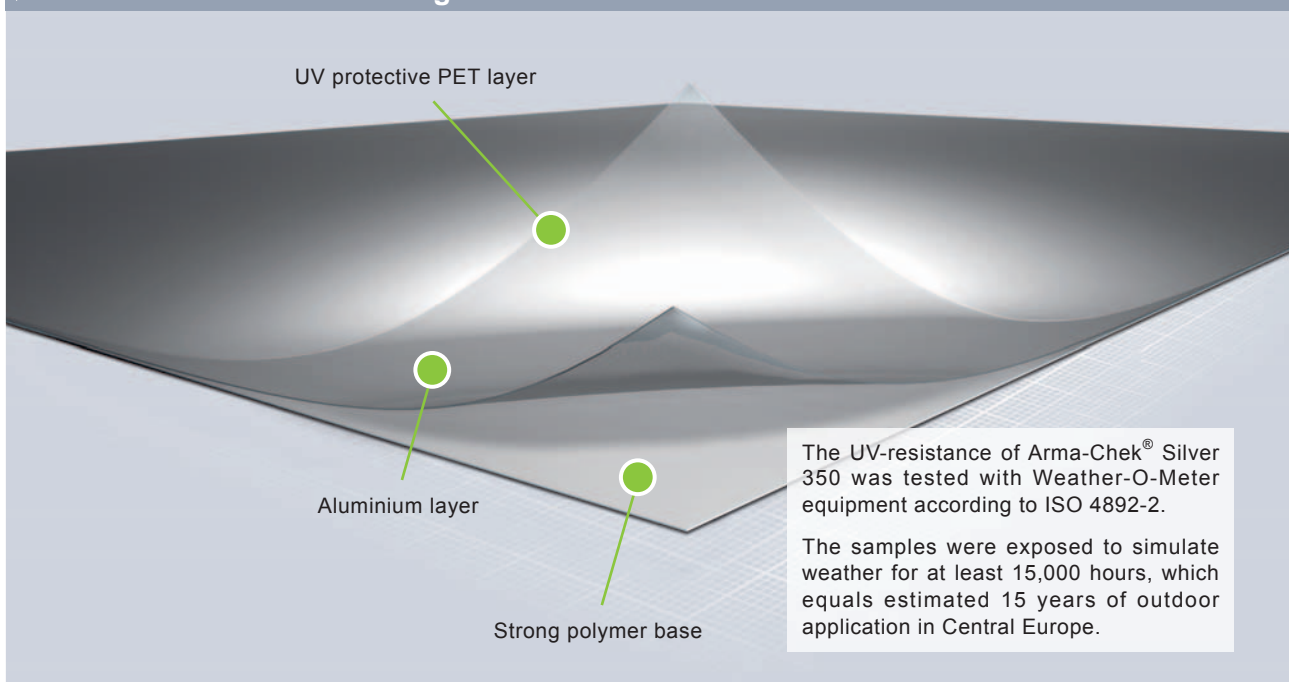
## ► New generation efficiency: optically smart at a competitive cost



### Easy to maintain

In the event of system maintenance, Arma-Chek® Silver 350 is quick and easy for removal and replacement. This requires far less skill than traditional metal cladding, and does not require the special tools and equipment necessary for metal. Joins in Arma-Chek® Silver 350 are quickly secured using either Armaflex 520 adhesive or plastic rivets, and then overlaps are sealed with Arma-Chek® Silver PSA Tape. The Arma-Chek Silver PSA Tape is designed to match the optical appearance of Arma-Chek® Silver 350, is suitable for both indoor and outdoor applications, and is fast and easy to apply.

## ► Excellent UV and weathering resistance



# Arma-Chek® Silver 350

## ► Technical data

	Values	Remarks
<b>Material</b>	3-layer composite film of metallic appearance with aluminium intermediate layer and UV protection	
<b>Total Weight</b>	512 g/m <sup>2</sup>	EN 22286
<b>Thickness</b>	350 µm	ASTM D5947-06
<b>Tensile Strength</b>	> 50 MPa	EN ISO 527-1: 1996 and EN ISO 527-3: 1995
<b>Elongation at Break</b>	> 50%	EN ISO 527-1: 1996 and EN ISO 527-3: 1995
<b>Tear Force</b>	> 7.0 N	ASTM D1938-08
<b>Puncture Resistance</b>	> 200 N	ASTM D4833-07
<b>Emittance</b>	Reflectance (ρ) 0.38 Emittance (ε) 0.62	ASTM E408, Method A
<b>Temperature Range</b>	-25°C to +75°C	
<b>UV &amp; Weathering Resistance</b>	Excellent	ASTM G 26A, ISO 4892-2 and JIS K 7350-2
<b>Saltwater Resistance</b>	No visible delamination or deformation	200 hour immersion in 10% saltwater, 23±2°C
<b>Surface Spread of Flame</b>	Class 1	Surface Spread of Flame according to BS 476 Part 7: 1997
<b>Fire Propagation</b>	Total Index (I) ≤ 12 Sub Index (i <sub>1</sub> ) ≤ 6	Fire Propagation according to BS 476 Part 6: 1989
<b>Fire Performance According to UK Building Regulations</b>	Class 0	
<b>Flammability Index</b>	3	AS 1530.2-1993
<b>LOI</b>	> 35%	ISO 4589-2: 1996
<b>SBI Reaction to Fire</b>	Class B	GB 8624

For chemical resistance, please consult Armacell's Technical Department.

### Specification clauses for engineers

Protective coverings shall be installed on areas of insulation that are exposed to weather, subject to mechanical damage or visible to building occupants.

The surface covering shall be Arma-Chek® Silver 350 or equivalent, made from a 3-layer composite film of metallic appearance with aluminium intermediate layer and UV protection. Material shall be 350µm in thickness, with a total weight ≥500 g/m<sup>2</sup>, and on pipe sections have a permanent curl. The material shall be Class B (GB 8624), Class 0 (BS 476) and have a Flammability Index ≤ 5 (AS1530.2).

Cladding shall be installed with 30mm – 50mm overlaps on all horizontal and longitudinal joints. On outdoor applications, joints along the material length shall be installed facing downward. The joints shall be secured with plastic rivets in the overlap area, installed every 200mm along the material length. Armaflex 520 adhesive can be used for flat sheets, or where restricted access prevents use of rivets. All joints and overlaps must be finished with Arma-Chek® Silver PSA Tape.

All bends, T-sections and encaps shall preferably be clad with thermoformed fittings of Arma-Chek® Silver 350. For fittings of an unusual shape, or large size, the cladding material should be cut and installed as per traditional metal cladding.

# Arma-Chek® Silver 350



## Arma-Chek® Silver 350 covering on rolls

Reference Code	Description	Width mm	Length m	Total Area m <sup>2</sup>	Weight kg
ACH-SI25	Arma-Chek Silver Roll	1,200	25	30	16
ACH-SICE25	Arma-Chek Silver Curl-Effect Roll	1,200	25	30	16

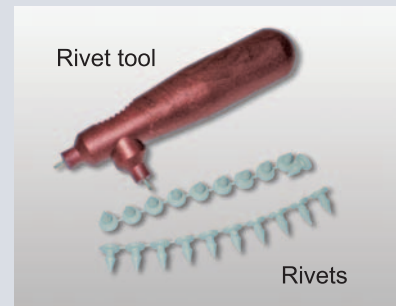


## Arma-Chek® Silver 350 installation accessories

Reference Code	Description	Width mm	Length m	Thickness mm	Rolls per Carton	Weight kg
ACH-PSATAPES-30	Arma-Chek Silver Tape 30mm	30	25	0.18	10	1.8
ACH-PSATAPES-50	Arma-Chek Silver Tape 50mm	50	50	0.18	6	3.4
ACH-TOOL	Rivet tool	-	-	-	1	-
ACH-RIVETS	Plastic rivets, pack of 1,000	-	-	-	1	-

## ► Installation recommendations

- For all pipe sections, only Arma-Chek® Silver 350 with curl-effect should be used. For flat surfaces such as ducts or large vessels, material without curl-effect should be used.
- On cold surfaces that require condensation control, ensure the lower surface coefficient of a reflective surface was considered when the insulation thickness was calculated (refer to Armacell for Technical Service if needed).
- The material and insulation surface should be clean and dry during installation. Installation should be conducted at ambient temperatures of greater than +5°C and in an ambient humidity below 80%.
- All joints and edges should have a 30mm – 50mm overlap.
- Overlaps should be secured with plastic rivets at 200mm intervals along the overlap's length. All joints must then be secured with Arma-Chek® Silver PSA Tape width, applied to the centre of each joint. In all areas, tape must always be secured by applying pressure from a plastic spatula.
- The number of joints should be minimized as much as possible.
- For flat sheets, and areas where access restricts fitting of rivets, joints may be secured with Armaflex 520 adhesive. Tape must also be used. In all areas, tape must always be secured by applying pressure from a plastic spatula.
- For outdoor applications, it is recommended that longitudinal joints are positioned downwards and ideally turned away from direct sunlight.
- For fittings such as elbows, tees and end-caps, it is recommended to use Arma-Chek® Silver 350 pre-formed fittings. Where unusual shapes are encountered or where fittings are very large, the covering may be cut and installed as per metal jacketing.



Rivet tool

Rivets



# Arma-Chek® Silver 350

## ► Product range

### Arma-Chek® Silver 350 elbows



19-20mm Insulation Thickness		
Pipe OD	Reference Code	Pcs/Carton
mm		
12	ACHB-20x12	20
18	ACHB-20x18	20
22	ACHB-20x22	20
28	ACHB-20x28	20
35	ACHB-20x35	20
42	ACHB-20x42	20
48	ACHB-20x48	20
54	ACHB-20x54	20
60	ACHB-20x60	20
64	ACHB-20x64	20
76	ACHB-20x76	20
89	ACHB-20x89	20
102	ACHB-20x102	20
108	ACHB-20x108	20
114	ACHB-20x114	20

### Arma-Chek® Silver 350 elbows



25mm Insulation Thickness		
Pipe OD	Reference Code	Pcs/Carton
mm		
22	ACHB-25x22	20
28	ACHB-25x28	20
35	ACHB-25x35	20
42	ACHB-25x42	20
48	ACHB-25x48	20
54	-	-
60	ACHB-25x60	20
64	-	-
76	ACHB-25x76	20
89	ACHB-25x89	10
102	ACHB-25x102	10
108	ACHB-25x108	10
114	ACHB-25x114	5
140	ACHB-25x140	5
159	ACHB-25x159	5
168	ACHB-25x168	5

### Arma-Chek® Silver 350 elbows



30mm Insulation Thickness		
Pipe OD	Reference Code	Pcs/Carton
mm		
22	ACHB-30x22	20
28	ACHB-30x28	20
35	ACHB-30x35	20
42	ACHB-30x42	20
48	ACHB-30x48	20
54	ACHB-30x54	20
60	ACHB-30x60	20
64	ACHB-30x64	20
76	ACHB-30x76	20
89	ACHB-30x89	10
102	ACHB-30x102	10
108	ACHB-30x108	10
114	ACHB-30x114	10
140	ACHB-30x140	10
159	ACHB-30x159	5
168	ACHB-30x168	5

### Arma-Chek® Silver 350 elbows



38-40mm Insulation Thickness		
Pipe OD	Reference Code	Pcs/Carton
mm		
22	ACHB-40x22	20
28	ACHB-40x28	20
35	ACHB-40x35	20
42	ACHB-40x42	20
48	ACHB-40x48	20
54	-	-
60	ACHB-40x60	20
64	-	-
76	ACHB-40x76	10
89	ACHB-40x89	10
102	ACHB-40x102	10
108	ACHB-40x108	10
114	ACHB-40x114	5
140	ACHB-40x140	5
159	ACHB-40x159	5
168	ACHB-40x168	5

## ► Flexible pre-fabricated elbows



A wide range of elbow sizes are available for Arma-Chek® Silver 350. It is important to select elbows based on both the pipe size and insulation thickness, as this ensures the correct bend radius.

# Arma-Chek® Silver 350

## ► Product range

### Arma-Chek® Silver 350 elbows



Pipe OD mm	50mm Insulation Thickness	
	Reference Code	Pcs/Carton
22	ACHB-50x22	20
28	ACHB-50x28	20
35	ACHB-50x35	20
42	ACHB-50x42	20
48	ACHB-50x48	10
54	ACHB-50x54	10
60	ACHB-50x60	10
64	ACHB-50x64	10
76	ACHB-50x76	10
89	ACHB-50x89	10
102	ACHB-50x102	5
108	ACHB-50x108	5
114	ACHB-50x114	5
140	ACHB-50x140	5
159	ACHB-50x159	5
168	ACHB-50x168	5

### Arma-Chek® Silver 350 end caps



Insulation OD mm	Reference Code	Pcs/Carton
60 - 70	ACHC-070	10
70 - 80	ACHC-080	10
80 - 90	ACHC-090	10
90 - 100	ACHC-100	10
100 - 110	ACHC-110	10
110 - 130	ACHC-130	10
130 - 150	ACHC-150	10
150 - 170	ACHC-170	10
170 - 190	ACHC-190	10
190 - 210	ACHC-210	10
210 - 250	ACHC-250	10
250 - 290	ACHC-290	10
290 - 330	ACHC-330	10
330 - 360	ACHC-360	10
360 - 400	ACHC-400	10
400 - 480	ACHC-480	10
480 - 530	ACHC-500	10

### Arma-Chek® Silver 350 tees



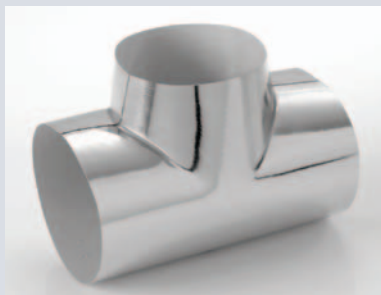
Insulation OD mm	Reference Code	Pcs/Carton
67	ACHT-067	20
73	ACHT-073	20
82	ACHT-082	20
88	ACHT-088	20
93	ACHT-093	20
100	ACHT-100	20
102	ACHT-102	20
108	ACHT-108	20
116	ACHT-116	20
120	ACHT-120	20
128	ACHT-128	20
130	ACHT-130	20
136	ACHT-136	20

### Arma-Chek® Silver 350 tees



Insulation OD mm	Reference Code	Pcs/Carton
140	ACHT-140	10
149	ACHT-149	10
156	ACHT-156	10
160	ACHT-160	10
169	ACHT-169	10
176	ACHT-176	10
182	ACHT-182	10
189	ACHT-189	10
194	ACHT-194	10
214	ACHT-214	10
245	ACHT-245	10
268	ACHT-268	10
300	ACHT-300	10

## ► Flexible pre-fabricated tees



The manufacture of traditional multi-piece cladding, either metal or flexible, can require complex shapes and skilled workmanship. Typically, this cannot be done on-site and requires a remote workshop with specialised tools. Preformed, flexible pieces of Arma-Chek® Silver 350 offer a significant advantage over such traditional metal.

# Arma-Chek® Silver 350

## ▶ Product range

### Arma-Chek® Silver 350 45-degree bends



Insulation OD mm	Reference Code	Pcs/Carton
52	ACH45-52	10
58	ACH45-58	10
62	ACH45-62	10
72	ACH45-72	10
75	ACH45-75	10
78	ACH45-72	10
82	ACH45-82	10
85	ACH45-85	10
88	ACH45-88	10
92	ACH45-92	10
95	ACH45-95	10
98	ACH45-98	10
102	ACH45-102	10
110	ACH45-110	10
115	ACH45-115	10
120	ACH45-120	10
128	ACH45-128	10
136	ACH45-136	10
141	ACH45-141	10
149	ACH45-149	10
154	ACH45-154	10
160	ACH45-160	10
167	ACH45-167	10
180	ACH45-180	10
189	ACH45-189	10
193	ACH45-193	10
206	ACH45-206	10
219	ACH45-216	10

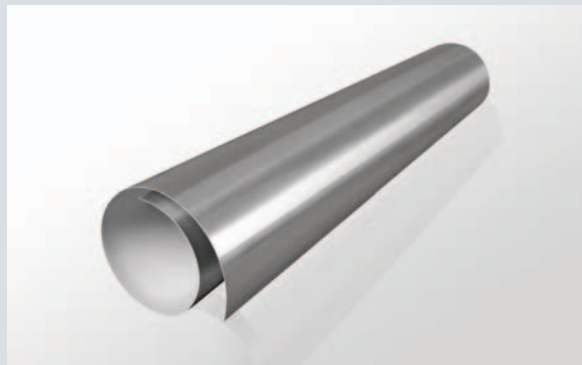


## ▶ Arma-Chek® Silver 350 pre-cut sheet

### Sizing guidance table: outer circumference (mm) of insulated pipes

Pipe OD mm	Insulation Thickness mm					
	13	19	25	32	38	50
12	119	157	195	239	276	352
15	129	167	204	248	286	361
20	145	182	220	264	302	377
22	151	189	226	270	308	383
25	160	198	236	280	317	393
28	170	207	245	289	327	402
32	182	220	258	302	339	415
35	192	229	267	311	349	424
42	214	251	289	333	371	446
48	233	270	308	352	390	465
54	251	289	327	371	408	484
60	270	308	346	390	427	503
67	292	330	368	412	449	525
73	311	349	386	430	468	544
76	320	358	396	440	478	553
80	333	371	408	452	490	566
89	361	399	437	481	518	594
93	374	412	449	493	531	606
102	402	440	478	522	559	635
105	412	449	487	531	569	644
114	440	478	515	559	597	672
140	522	559	597	641	679	754
168	610	647	685	729	767	842

Note: when sizing Arma-Chek® Silver 350, add an overlap (30mm to 50mm) to the circumference. To order pre-cut sheet, first identify the circumference, then add 30mm - 50mm, and round-up to the nearest 10mm; for example, a 76mm pipe with 19mm insulation has a 358mm circumference. Pre-cut sheet size is 358mm + 50mm = 408mm, rounded up to 410mm.



Armacell can provide sheet pre-cut, in lengths from 150mm to 1,000mm (all 1,200mm width). These can speed installation time. Minimum order quantities apply.



www.armacell.com

All statements and technical information are based on results obtained under typical conditions. It is the responsibility of the recipient to verify with us that the information is appropriate for the specific use intended by the recipient.

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