SYSTEM XFR® DWV

Contractors installing DWV pipe in high buildings and plenums had few alternatives to heavy cast iron and copper. IPEX has changed that. System XFR® is the world's first PVC DWV system rated for high buildings and air plenums where the National Building Code mandates more stringent Flame Spread and Smoke Development requirements which previously limited the use of thermoplastic.

Suitable for use in noncombustible environments, System XFR's advanced material has a Flame Spread Rating of 25 and Smoke Developed Classification of 50 which permits it to be installed in High Buildings and Air Return Plenums in accordance with local Codes.

And in addition to its flame and smoke attributes, System XFR delivers all the performance advantages you'd expect from thermoplastic piping.

APPLICATIONS

Drain Waste and Vent Piping in:
- Commercial
- Industrial
- Residential
- Above ground or underground

STANDARDS

CSA B181.2
CAN/ULC S102.2

ADVANTAGES

1 Flame & Smoke
System XFR possesses superior fire- and smoke- retardant capabilities. When tested to the CAN/ULC S102.2 Standard, System XFR achieved a Flame Spread Rating of not greater than 25 and a Smoke Developed Classification of not greater than 50.

2 Code Compliance
Ideal for noncombustible applications, System XFR meets these national and provincial building codes:
- High buildings as defined by NBC article 3.2.6
- Air plenums as defined by NBC article 3.6.4.3
- Noncombustible construction as defined by NBC article 3.1.5
- Penetrating a rated fire separation as defined by NBC article 3.1.9.4.(4)

3 High Impact Resistance
Thanks to its advanced materials, System XFR demonstrates a high impact strength in cold temperatures. Impact-tested at 0 ℃ and 23 ℃, XFR is tough enough to exceed the CSA requirements.

4 Improved Flow
System XFR has a substantially lower roughness factor compared to metal systems, allowing for overall improved flow. It's also made with a larger inside diameter which provides a greater cross-sectional area for flow and raises both carrying capacity and flow rates. This feature gives engineers the versatility to design smaller, compact systems that can still handle the necessary flow rates.

5 Lower Thermal Conductivity
System XFR sweats less than metal pipe due to its excellent insulating properties. As a result, XFR can reduce — and in many cases, eliminate — the need for insulation.

6 Comparable Noise Attenuation
In real world sound tests performed on constructed buildings, IPEX DWV systems have proven to provide comparable noise attenuation when compared to cast iron from drainage flow. Numerous installations from schools to hospitals and nursing homes have been plumbed with these IPEX drainage systems, all proving that in these critical installations the IPEX systems measure up in terms of sound transfer.

SYSTEM XFR — the world's first uncoated PVC rated for high buildings and plenums where tighter fire and smoke regulations have previously limited the use of thermoplastic.

Suitable for use in noncombustible environments, System XFR's advanced material meets all fire-resistance and smoke development codes. Its revolutionary fire-retardant properties virtually eliminate flame spread and reduce the volume of smoke generated.

SHORT FORM SPECIFICATIONS

SYSTEM XFR DWV PIPE AND FITTINGS

IPEX System XFR Drain, Waste and Vent pipe and fittings shall be certified to CSA B181.2 and when used in noncombustible construction, high buildings and air plenums, they shall be tested and listed in accordance with CAN/ULC S102.2 and clearly marked with the certification logo indicating a Flame Spread Rating not more than 25 and a Smoke Developed Classification not exceeding 50.
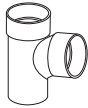
System XFR® pipe and fittings have been tested and certified by CSA to the CSA B181.2 standard. System XFR pipe and fittings are listed with ITS (Warnock Hersey) to exhibit Flame and Smoke values as per CAN/ULC S102.2-10.
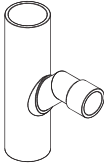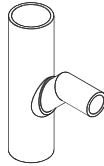
Test Results

ITS (Warnock Hersey) conducted the testing in accordance with CAN/ULC S102.2 test standard. The following table summarizes the results of these tests.
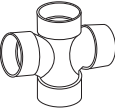
Component	Flame Spread Rating	Smoke-Developed Classification
System XFR®		
Pipe	≤ 25	≤ 50
Fittings	≤ 25	≤ 50
Fabricated PVC fittings with XFR Coating	≤ 25	≤ 50
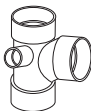
PRODUCT SELECTION CHART - SYSTEM XFR

Left Column

	Dimension		Product
	inches	mm	Code

Sanitary Tee   Sp x H x H
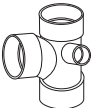
	inches	mm	Code
	1-1/2	40	526550
	3 x 1-1/2	75 x 40	526552
	4	100	426557

Sanitary Tee   Sp x Sp x H   *FOR USE WITH MJ GREY*
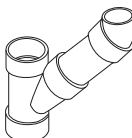
	inches	mm	Code
	8 x 4	200 x 100	526926
	8 x 6	200 x 150	526998
	10 x 4	250 x 100	526997
	10 x 6	250 x 150	526758
	12 x 4	300 x 100	526761
	12 x 6	300 x 150	526762

Sanitary Tee   Sp x Sp x Sp   *FOR USE WITH MJ GREY*

	inches	mm	Code
	8	200	526999
	10 x 8	250 x 200	526759
	10	250	526760
	12 x 8	300 x 200	526763
	12 x 10	300 x 250	526764
	12	300	526765

Double Sanitary Tee   H x H x H x H
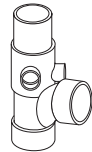
	inches	mm	Code
	1-1/2	40	526542
	2	50	526543
	2 x 1-1/2	50 x 40	526547
	3	75	526544
	3 x 1-1/2	75 x 40	526538
	3 x 2	75 x 50	426539
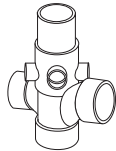
Sanitary Tee Side Inlet   (left hand)   H x H x H x H SI

	inches	mm	Code
	3 x 3 x 3 x 1-1/2	75 x 75 x 75 x 40	526395
	3 x 3 x 3 x 2	75 x 75 x 75 x 50	526396

Sanitary Tee Side Inlet   (right hand)   H x H x H SI x H

	inches	mm	Code
	3 x 3 x 3 x 1-1/2	75 x 75 x 75 x 40	526397
	3 x 3 x 3 x 2	75 x 75 x 75 x 50	526398

Upright Extended Wye   H x x H x Sp

	inches	mm	Code
	3	75	526006

Right Column

	Dimension		Product
	inches	mm	Code

Single Apartment Fitting   H x Sp x H

	inches	mm	Code
	3	75	526007

Double Apartment Fitting   H x Sp x H x H

	inches	mm	Code
	3	75	526008

90° Elbow   H x H

	inches	mm	Code
	1-1/2	40	526121
	1-1/2 L	40 L	426024
	2	50	526035
	2 L	50 L	526122
	3	75	526025
	3 L	75 L	526123
	4	100	526124
	6	150	526125
	8	200	526126
	10	250	526127
	12	300	526128
	14	350	526129
	16	400	526130
	18	450	526131

90° Elbow   Sp x H

	inches	mm	Code
	1-1/2	40	526231
	2	50	526232
	3	75	526233
	4	100	526234
	6	150	526235
	8	200	526236
	10	250	526237
	12	300	526238
	14	350	526135
	16	400	526136
	18	450	526137

90° Elbow   Sp x Sp   *FOR USE WITH MJ GREY*

	inches	mm	Code
	8	200	526967
	10	250	526968
	12	300	526970

90° Reducing Elbow   Closet Bend Reducing   Sp x H

	inches	mm	Code
	4 x 3	100 x 75	426026