Work Zone / Gap Stop Window & Door Foam Sealant

TECHNICAL DATA SHEET

1. PRODUCT NAME

Work Zone / Gap Stop Window & Door Foam Sealant

2. MANUFACTURER

ICB Products, 75 Chambers Drive, Unit 9, Ajax, Ontario, L1Z 1E1. Phone: (905) 619-0115 FAX: (905) 619-6583

3. PRODUCT DESCRIPTION

Work Zone / Gap Stop Window & Door Foam Sealant is a high yield foam that expands with low pressure and may be used for filling, sealing, and insulating. The unique chemistry of this product is distinctly different from standard foams. This low-pressure foam is actually self-venting which means that once it fills the void, the trapped CO² simply leaves the product, unlike conventional expanding foams that may continue to expand and apply pressure against the substrate. This is ideal for sensitive areas like around window



and door frames where the gap can be sealed without bowing the frame, even if the area is overfilled with foam. It is an aerosol driven one component, moisture curing polyurethane material, which cures to a closed cell, semi-rigid foam with cellularity high for excellent insulation against heating and cooling loss, and exhibits enough elongation and flexibility to ensure an excellent and permanent seal. Its adhesive properties are excellent to ensure that it will stay in place, and not release from the surfaces to be sealed. The cured foam blocks out drafts, dirt, water, and is insoluble, rot proof, vermin resistant, non-toxic, and will not absorb water. The can dispensing valve has been specially designed to accurate control maximum flow for filling, minimum flow for caulking type beads.

Basic Use: Highly recommended to fill gaps and spaces around windows & doors both in new construction and replacement windows & doors. Although specifically engineered for use around windows & doors, it is not limited to these applications, and may be used in most any application where standard foams are used. Work Zone / Gap Stop Window & Door Foam is coloured blue for easy visual confirmation that certified window & door foam has been used. This product outperforms fiberglass and regular foams when used around windows & doors, and guarantees the best possible performance in these applications.

Composition and Materials: Work Zone / Gap Stop Window & Door Foam is made of polyurethane prepolymers, and aerosol propellants. It also contains fire retardant to reduce the rate of burning.

Colour: Blue. May be painted.

Sizes: 340 & 566 gram can with straw type applicator, and 566 gram gun foam can for use with gun applicators.

Grade: Professional grade.

Limitations: Cured foam must not be permanently exposed to ultraviolet light, as it would start to deteriorate in 2-3 days. If the foam is going to be exposed, it should be painted or covered for protection against ultraviolet radiation deterioration. Cured foam should not be exposed to temperatures above 115°C (240°F). Excessive temperature will cause deterioration of the foam. Aerosol propellants are affected by cold temperatures, and will reduce in pressure as the temperature falls, which may result in insufficient pressure to fully empty the can. To ensure that aerosol pressure is sufficient to empty the can, keep the can warm until ready for use. All polyurethane foams require available moisture from the air for curing, and will change in physical characteristics curing time in temperatures where there may be little or no moisture in the air. Do not apply in totally confined spaces, as the sealant requires atmospheric moisture to cure. For best results, apply at temperatures between 15°C $(60^{\circ}F)$ and $40^{\circ}C$ $(100^{\circ}F)$. As with all types and brands of polyurethane foam sealants (with the exception of Work Zone / Gap Stop All Seasons Gun Foam), application below 5°C (40°F) is not recommended. To promote proper curing of foam during colder or very dry periods, moisten surfaces with water before application. Before product application, user should determine suitability of Work Zone / Gap Stop Window & Door Foam for intended use. Polyurethane foams cannot be used as a fire stop material.

4. TECHNICAL DATA

Listed data are based on laboratory results and may differ in practical application. All values will vary with humidity, temperature, and foam thickness.

Yield - cured foam in 1cm(3/8")bead 340 gr. - up to 114 metres (370') 566 gr. - up to 271 metres (880') Expansion Rate (increase in volume due to expansion) - Approx 100% *Density* - 1.3 - 1.8 Lb./ft³ Cure time @20°C and 40% R.H. Tack Free - Approx. 15 min. Ready to cut - 30-60 minutes, depending on bead size and depth. Thermal Resistance - R4.5-5.5 / in. Cellularity - 80% closed cell (see note 1 below) Water Absorption - 0.4% Vol. UL Classified: ASTM-84 Flame spread - 5 Smoke Density - 25 Odour - slight Freeze-thaw stability - stable Shelf life - 2+ years. Storage temperature - +5°C to 37°C (40°F to 100°F)

Note 1 – In cross section, the foam structure is 80% closed cell. In a 1" foam bead, from 25-50 layers of gas pockets (bubbles) are present. By simple math, each successive layer of bubbles will close off 80% more openings, until after ½", the foam bead will provide an air barrier which is at least 99.9936% effective, and after ½", the foam will provide and air barrier which is practically 100% effective. This makes the foam sealant an excellent choice for use in airflow containment, acoustical applications, and as a full block vapour barrier.

5. INSTALLATION

General Preparation: Wear work clothes, gloves, and eye protection. Cover adjacent finished surfaces, finished floors, and carpets. Shut off all gas pilot lights and other sources of ignition before and during use. Shake can vigorously before use.

Surface Preparation: Surface should be free of contaminants, dirt, standing water, oil, or solvents. Moistening dry surfaces is recommended for optimum performance.

Filling Area: Hold can upside down during application. Fill cavities 60% to allow for expansion. Fill very large areas or apertures in layers rather

than one application, and work from bottom to top.

Post Application: Cured foam may be cut, sanded, painted, or coated with plaster or fillers. Exposed foam should be painted or covered to protect from UV light.

Cleanup: Uncured foam may be removed with acetone, paint thinner, or nail polish remover. Dried foam is very difficult to remove, and can only be removed mechanically.

6. PRODUCT SAFETY

CAUTION:

MDI Contains Monomer. Polyurethane Resin Propane/Isobutane propellant. DRIED FOAM EXPOSED TO TEMPERATURES IN EXCESS OF 115°C (240°F) MAY RELEASE HAZARDOUS DECOMPOSITION PRODUCTS. Product is flammable during dispensing. Shut off all gas pilot lights and other sources of ignition before and during use. DO NOT smoke or use matches/lighters while dispensing foam. Accumulated vapours may cause flash fires or ignite explosively. Ventilate work area with moving air. Overexposure to vapours may cause dizziness or headache - move to fresh air. Do not puncture, expose to heat or store at temperatures above 49°C (120°F). Wear protective gloves, clothes, and eye protection. Use drop cloths. In case of eye contact, flush eye with water for 15 minutes and get immediate medical attention. If ingested, call a physician. REMOVE WET **FOAM IMMEDIATELY** FROM SKIN AND CLOTHES WITH ACETONE. **PAINT** THINNER, OR NAIL POLISH REMOVER. DRIED FOAM IS HARD TO REMOVE FROM SKIN AND CLOTHES. If foam dries on skin, apply generous amounts of petroleum jelly or lanolin, leave on for one hour, wash thoroughly, and repeat process until foam is removed. Do not attempt to remove dried foam with solvents. KEEP OUT OF REACH OF CHILDREN.

7. AVAILABILITY AND COST

Marketed throughout Canada and some foreign countries. Work Zone / Gap Stop Window & Door Foam is sold through building supply, hardware, paint, and specialty distributors. Costs are available from local Work Zone distributors and representatives, or from company corporate offices.

8. WARRANTY

ICB Products warrants that Work Zone / Gap Stop Window & Door Foam is manufactured according to our published standards, and that it is free from defects. ICB Products will provide replacement for, or refund the purchase price of, that portion of material which proves defective. This constitutes the limit of ICB Products' liability and obligation. The company will not be liable for any injury, loss or damage, direct or consequential, arising out of the use of or the inability to use the product. Before using, user must determine suitability of the product for intended use, and user assumes all risk and liability whatsoever in connection therewith.

9. MAINTENANCE

No maintenance is required for properly applied, cured product.

10. TECHNICAL SERVICES

Technical assistance is available from ICB Products corporate offices only. Information and testing results are guidelines only and not intended for preparing specifications.

11. FILING SYSTEMS

- Technical Data Sheet
- Product catalogues, brochures.
- Additional product information is available upon request

12. COPYRIGHT

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