









Custom Fabricated Tool Protectors

Hi-Tech Seals & Cast Urethane

Thread protectors are typically made of low-density polyethylene, metal or polyurethane. Polyethylene is the material of choice of large volume disposable protector products. Polyurethane protectors have been adopted because they provide unmatched tear, shock and abrasion resistance, all combined in a lightweight material. Additionally, polyurethane protectors can often be reused. Hi-Tech Seals cast urethane division combines unique tooling capabilities and a full spectrum of customization options.

Hi-Tech Seals new 3D printer gives us enhanced capabilities for creating custom threading such as:

ACME:

API Regular, Full Hole, Internal Flush, Numbered Connections;

American MT, PAC, Open Hole;

Hughes Double Streamline, H90, Slim Hole, Slimline H90, Extra Hole, External Flush;

Reed External Flush, Wide Open, Full Hole, Extra Hole; Sucker Rod; and Tool Joints

Our team of draftsmen and engineers can send a CAD drawing to the acrylic 3D printer to create a replica part; the replica is then used to make a mold. This improved process allows us to avoid expensive tooling costs, thus allowing us to economically produce short to medium production runs.

An added benefit of our in house manufacturing process is that it allows us to incorporate company logos, part numbers and custom colours. To learn more about our cast urethane capabilities visit www.hitechseals.com/cast-urethane.asp.





Technically Speaking

Understanding ASTM D2000

The American Society of Testing & Materials established a standard (ASTM D2000) to provide guidance in the selection of vulcanized rubber materials such as natural rubber, reclaimed rubber, synthetic rubber, etc. The standard is arranged in a simple line call-out specification for each unique compound and durometer. Specifying your elastomer via a line call-out affords you the flexibility of using different manufacturers' compounds while ensuring that the material quality and performance stay consistent.

What is a Line Call-Out and How Do I Read It?

For the purpose of this article we will use a typical 70 durometer compound line call-out. This line call-out would be indicated on a specification sheet as conformance to:

ASTM D2000 M2 BG 7 14 B14 EA14 EF11 EF21 EO14 E034 Z1 Z2 Suffix Requirement tests Tensile Strength Hardness Type (Heat Resistance) Class (Oil Resistance) Grade Number Metric Unit

How to Read the Line Call-Out:

ASTM D2000 = Standard

M = Unit of measure. The "M" indicates that the document is compiled in SI (metric) units - for example, tensile strength is in megapascals (MPa). If "M" is not present, imperial units are being used - pounds per square inch (psi).

2 = Grade Number. The grade defines specific added test requirements found in the ASTM D2000 document. All grades, with the exception of grade 1, have specific test criteria. Grade 1 indicates that only the basic requirements are compulsory. Grade 2, as seen above, indicates that there are additional requirements that are spelled out in the ASTM D2000 document.

B = Type. Type is an indication of the heat resistance properties of the elastomer compound. Type B corresponds to a 100°C (212°F) test temperature.

 \mathbf{G} = Class. The class indicates oil resistance properties of the elastomer, specifically resistance to swelling under Industry Reference Material (IRM) 903 oil. Class \mathbf{G} indicates a maximum swell of 40%.

714 = Hardness and Tensile Strength. The first digit (7) indicates the Shore A durometer. The next two digits (14) indicate the minimum tensile strength, i.e. 14 MPa.

B14 EA14 EF11 EF21 EO14 E034 Z1 Z2 = Additional Test Requirements.



^{*} Test criteria play an important role in helping you identify that you receive a consistent material across suppliers.

Urethane Test Gaskets

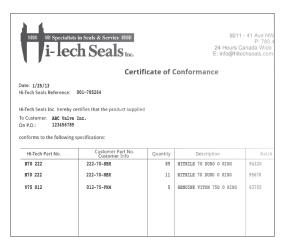
Replacement for Rubber Coated Gaskets

Hi-Tech Seals manufactures polyurethane ring joint gaskets for application testing. The polyurethane ring joint gaskets are an effective and non-damaging method for testing your gland before use. The unique profile is used to energize the seal in the groove under pressure, thus replicating a stainless steel R, RX, or BX ring joint gasket.

With a large inventory of Urethane tube stock, Hi-Tech Seals has the ability to produce custom prototypes or production run parts in a timely matter. Custom made urethane ring joint gaskets have been proven to last through more tests per piece than traditional rubber coated ring joint test gaskets. They have been reported to last upwards of 100 test runs at 15,000 PSI.



To learn more about Polyurethane Ring Joint Gaskets contact your Hi-Tech Seals or Hi-Tech Gaskets representative or visit: www.hitechseals.com/products/gaskets-ring-type-mfg.asp





New Certificate of Conformance and Package Labels

Batch & Cure Tracking

Hi-Tech Seals has always been committed to quality; a large part of which is product traceability. We are now proud to offer traceability on all products at Hi-Tech Seals.

Hi-Tech Seals has developed a newly automated Certificate of Conformance, which can now be printed upon customer request. The new Certificate of Conformance helps avoid long processing times required to create custom Certificates of Conformance. The template allows us to get any and all information a customer may require for their Certificate of Conformance. This includes your purchase order number, the Hi-Tech Seals part number, customer part number or description, quantity, Hi-Tech Seals description, batch, cure, expiry and country of origin.

To go along with the Certificate of Conformance we have also updated our labeling system. The new, larger, customer labels include all of our current information as well as gives us the ability to customize them. Customer logos, part numbers, bin locations, bar codes and other information can now be added per customer request. These labels have also been reorganized to better separate customer and Hi-Tech Seals information. In the end, these will make our product tracking, certificates and labeling more efficient and economical.

If you are interested in learning more, please contact your sales representative or email *info@hitechseals.com*.



Expanding Our Sales Staff

To Serve you better...

Hi-Tech Seals has expanded our service capabilities. We are pleased to introduce several new members to our team. Hi-Tech Seals would like to welcome the following Customer Service and Sales Representatives to our team:

Randy Camponi - Technical Sales – Edmonton

Jeff Chimera - Technical Sales - Edmonton

Graham Smith - Technical Sales – Edmonton

Steve Sims - Technical Sales - Calgary

Kyle Wanvig - Outside Sales - Calgary

Cody Guenther - Outside Technical Sales – Calgary

Tim Carey - Outside Sales - Winnipeg

Chris Ammar - Inside Sales – Edmonton Hi-Tech Gaskets

A special welcome goes to:

Dave Fawcett - Vice President of Sales and Marketing



Dave Fawcett

Dave has been in the Oilfield Supply and Distribution business for 28 years. Dave's objective is to help support Hi-Tech Seals in becoming "the best in-class distributor for our products".

Review Gasket Inventory Online!

You can now review our inventory of Ring Joint Gaskets, Spiral Wound Gaskets, Expanded PTFE, Isolation Kits, Sheet Material and more at www.hitechgaskets.com. To request a username and password, please email info@hitechgaskets.com



Milestones

We are pleased to share with you employees that have achieved milestones in recent months.

Five years of service:

Csaba Fojt Graham Necyk Tom Hinks

Jesse Tanner

Ten years of service:

Jane Krause

From all of the staff at Hi-Tech Seals, we thank you for your hard work and dedication over the years.



Ethics Reporting

We CARE. Do You?

Hi-Tech Seals has revised its Code of Conduct policy to reinforce its zero-tolerance approach taken towards unethical behaviour within its business dealings.

To ensure that business partners and employees observe the highest ethical standard of integrity and honesty, we have implemented CARE. CARE is a reporting mechanism that provides confidential communication between senior management, employees, vendors and customers to be used in the event that anyone is observed not acting with due skill, care, diligence and/or fairness.

Here at Hi-Tech Seals we encourage ethical conduct in our employees and suppliers. In order to safeguard against unethical behaviour we would like to invite you to help us by reporting any wrong doing or unethical behaviour that you observe. Users can report any number of concerns related to fraud, theft, conflicts of interest, etc. using the CARE program.



How to Raise a Concern

Any person with any concern relating to wrongdoing by employees, suppliers, or offices of Hi-Tech Seals may report their concerns using one of the following methods:

Phone: 1.855.484.2273
Email: UseCARE@ca.gt.com

Secure Website: www.GrantThorntonCARE.ca

Anonymity

CARE is independently owned and operated by Grant Thornton LLP and is not affiliated with any organizations participating in the CARE program. The CARE website is designed for anonymity; however, an option is provided should you choose to identify yourself. Grant Thornton LLP does not track any IP addresses of users of the CARE website.

Please see our website for a copy of our Code of Conduct or CARE Policy: www.hitechseals.com/ethics.asp.

Remember – It's right to report a wrong



Hi-Tech Seals Fill-in-the-blanks

Answer the following five questions and be entered to win an Apple TV!

1	Fluorocarbon's (FKM)	common trade name:	
	/		

(2)	Highly Saturated	Nitrile's operating rang	ge:°C to+_	°C
\circ	Tilgilly Jaculated	Tritine 3 Operating rang	50. — 0 10 1 —	

4	Three listed suitable chemicals that	vou can use Nylon – Polyamide (PA	() in
•	THICE IISTER SUITABLE CHETTICAIS THAT	you can use hylon I olyanilae (17)	1

Visit www.hitechseals.com/material-summary.asp to find the answer!

Please fax your responses to 780.409.9149 by July 15th, 2013.

Name: _______
Company: ______
Day Time Phone #: ______

Congratulations to last edition's crossword winner, Bill Clarke.





Edmonton | AB | 9211 - 41 Avenue NW | T6E 6R5 Ph: 780.438.6055 | Fax: 780.434.5866 | Email: info@hitechseals.com Toll Free Ph: 1.800.661.6055 | Toll Free Fax: 1.800.465.5866



Hi-Tech Seals Branches:

Bay #3, 5940 - 30 St. SE | Calgary, AB | T2C 1X8 | Ph: 403.720.2856 | Fax: 403.279.2662

445 Egesz St. | Winnipeg, MB | R2R 2V5 | Ph: 204.775.7881 | Fax: 204.775.7954

1180 Kerrisdale Blvd; Unit #8 | Newmarket, ON | L3Y 8Z9 | Ph: 905.953.9666 | Fax: 905.953.8739

1450 Rue Nobel, Suite #20 | Boucherville, QC | J4B 5H3 | Ph: 450.655.7325 | Fax: 450.655.7359

105 Gladstell St. | Conroe, TX | United States | 77301 | Ph: 936.206.3124 | Fax: 936.756.0538

Hi-Tech Gasket Branch:

8760 50 Ave NW | Edmonton, AB | T6E 5K8 | Ph: 780.439.4894 | Fax: 780.436.9502