

## About DynaGlide® and DynaGlide Plus® Multi-Purpose, Micro-Layered, Dry Boundary Films Conditioner/Lubricant.

**DynaGlide® - Micro-Layered, Dry Dual-boundary (6 layer)-Films Lubricants** are self-leveling, non-gumming, high pressure resistant, proprietary lubricants. The new **DynaGlide Plus® - Micro-Layered, Dry Tri-boundary (9 layer)-Films Lubricant** referred to in this document are also classified as “**BOUNDARY**” lubricants and are ideally suited to the firearm industry due to their exceptional performance under high pressure, high heat conditions and extreme environmental exposures. *The DynaGlide Plus® Micro-Layered, Dry-Boundary Films Lubricant is known for its stability and non-migrating features that will stay where applied.* DynaGlide® has been made available to the shooting industry exclusively by the Hornady Company since 1986.

**DynaGlide Plus® Micro-Layered, Dry-Boundary Films Lubricant** exceeds the current military specifications for lubricants by over six times. These micro-thin film lubricants are unrivaled in their ability to defend against dust, grit, powder residues, gunky foreign matter and stay fully functional in extreme cold conditions below -40 degrees and above 400 degrees Fahrenheit. Through the use of additional proprietary film additives **DynaGlide®** has extended the protective and self-maintaining capacities as well as the effects of its various film products to address environments of rapid and frequent changes in humidity, condensation and moisture, variable temperature, atmospheric pressures, surface load pressures and extreme heat.

**DynaGlide Plus® Micro-Layered Dry-Boundary Films Lubricant** performance characteristics directly address the major breech/leade issues that take place during and after the millisecond of bullet ignition. *These breech/leade issues and the resulting firing actions taking place can and do affect the speed/accuracy of the firearm and the velocity/action of the projectile.*

**DynaGlide Plus® Micro-Layered, Dry-Boundary Films Lubricant** conditions the firearm as it dries (within two to three minutes of application) and does not create or contribute to conditions that result in powder residue gunk buildup and the attraction of environmental or chemical pollutants. *Conversely traditional wet solvent cleaners, lubricating oils and silicone lubricants significantly accelerates fouling, gumming and gunking. Additionally wet cleaning solvents residually weaken lubricating oil viscosities which directly contribute to carbon buildup and its abrasive effects.* **DynaGlide Plus® Micro-Layered, Dry-Boundary Films Lubricant** performance is most significantly realized during extended firearm use and or high numbers of rounds fired, with a self-cleaning characteristic that sheds debris and pollutants through “blow out” via the firearm barrel and gas ports with each round fired. **DynaGlide Plus® Micro-Layered, Dry-Boundary Films Lubricant** resists leading build-up at the microscopic level and all but eliminates the need to use toxic cleaning solvents and wire brushes. *Major cleaning cycles are considerably less frequent, difficult and time consuming.*

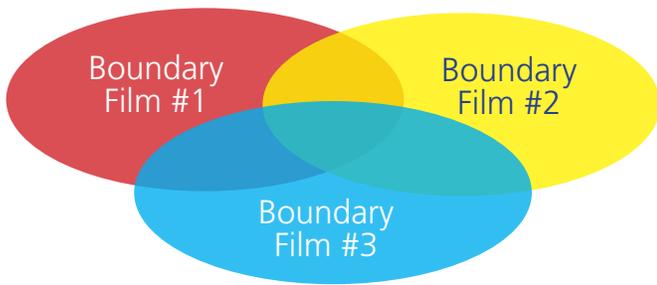
**DynaGlide Plus® Micro-Layered, Dry-Boundary Films Lubricant** technologies have effectively created a new paradigm in firearm cleaning and maintenance, one that emphasizes easy and quick firearm pre-conditioning with maintenance “touch up” as needed, rather than traditional (post-shooting session) firearm cleaning that is “messy”, time consuming and labor intensive. If the firearm has been sufficiently pre-conditioned as per **DynaGlide Plus®** directions, reconditioning and clearing the firearm after shooting can quickly and easily be achieved by running a gun patch down the firearm barrel, wipe-down with a clean rag and the firearm is ready for storage. (See web site)

The proprietary ingredients in the **DynaGlide Plus® Micro-Layered Dry-Boundary Films Lubricant** technologies are non-toxic, do not contaminate the environment and do not migrate into gun powders and primers. *(Many of today's lubricants are formulated with Silicone which do migrate).* **DynaGlide Plus® Micro-Layered Dry-Boundary Films Lubricant** technologies address important environmental concerns and help to set a standard for new products that satisfy user preference and emerging governmental codes and compliance regulations (foreign and domestic).

**DynaGlide Plus® Micro-Layered Dry-Boundary Films Lubricant** technologies do not include any Teflon which have been found to cause wear and may be toxic (see Wikipedia reference).

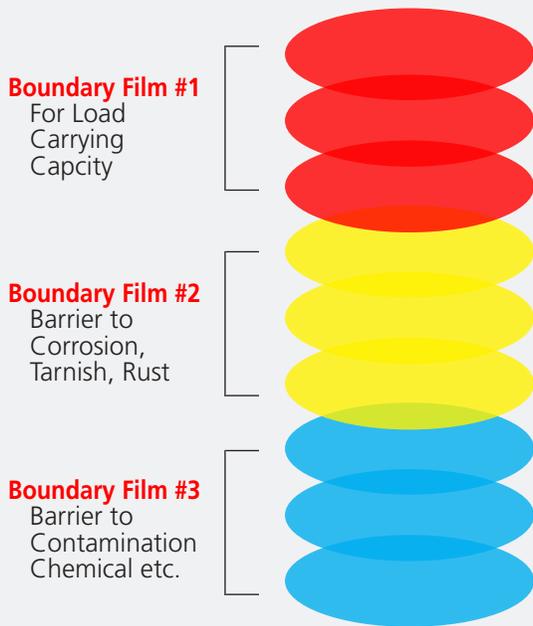
No **DynaGlide®** formulations changes were required under the new Military specifications (**AF-5272**) being introduced that will replace the **MIL-PRF 63460** specifications, because of the continued upgrading of the formulas over the years since 1986.

**DynaGlide Plus® Dry boundary films Conditioners/lubricants provide a broad spectrum of protections through engineered, three boundary (micro-layered) film formulas.**



*DynaGlide Plus® three boundary (micro-layered) films combine to play a major role in determining the bulk physical properties and behaviors of the conditioner/lubricant (specifically, how it interacts with heat, chemicals, solvents and contamination, etc).*

**DynaGlide Plus® formula's "three Boundary Films" are comprised of three Co-polymer/Block-polymer Micro-Layered components.**



**DynaGlide Plus® Micro-Layered Tri-Boundary Dry Films components combine to form a uniform film protective barrier free of gaps or irregularities.**

DynaGlide Plus® Micro-Layered Dry-Film Lubricants displaces contaminants and establishes a **Micro-thin-film** conditioning buffer that is extremely resistant to heat, wear, corrosive and chemical contaminants, and moisture.



*Microscopic view of a Micro-Layered conditioned surface.*

**Benefits Section:**

**DynaGlide Plus® Micro-Layered, Dry Boundary Films Conditioners/Lubricants offer the firearm owner a powerful way to keep a firearm in pristine condition through a broad spectrum of protective, and time/labor saving benefits.**

**With DynaGlide Plus® preconditioning a firearm (as a preventative to fouling and wear) is more efficient than "after the fact" traditional, abrasive, messy and labor intensive cleaning.**

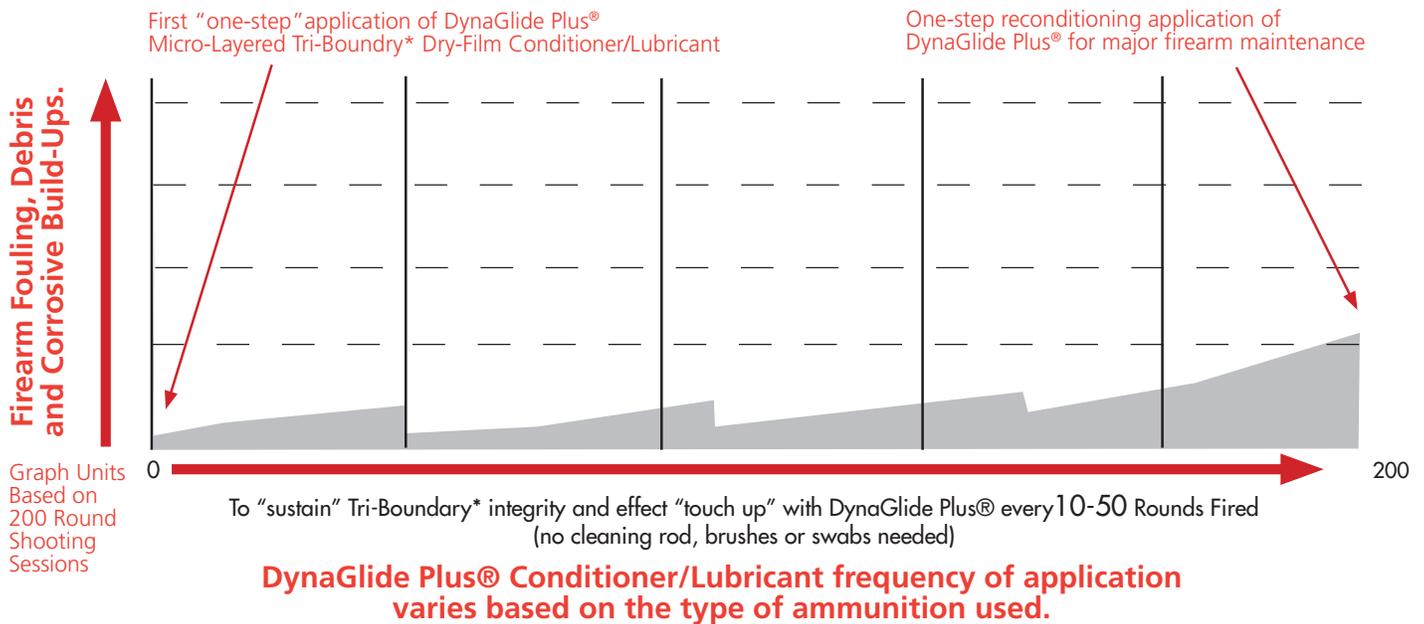
dynaGlide® has engineered Co-polymers and Block-polymer technologies into highly efficient Micro-Layered, Tri-Boundary Dry-Films lubricant that has the unique characteristic of being self-cleaning. These new Micro-Layered, Tri-Boundary Dry-Films lubricants have revolutionized the materials and techniques involved in firearms cleaning and maintenance.

Micro-Layered, Tri-Boundary Dry-Films lubricants provide; 1) high load carrying lubrication to resist (heat, metal to metal pressures and wear), 2) temperature reactive corrosion, and chemicals resistance (rust, corrosion and tarnishing), 3) chemical to chemical contamination resistance (environmental, and external contamination).

**DynaGlide Plus® Micro-Layered Tri-Boundary Dry-Films Conditioners/lubricants offer a broad spectrum of protection not found in other gun conditioner or lubricant products:**

- Heat resistant to 400-plus° (204 plus °C)
- High load carrying capacities (metal to metals pressure)
- Hazardous cleaners and lubricants are not used or needed
- Prevents Burnt Carbon and Lead build-ups
- Humidity and Moisture repelling and displacing
- Prevents the accumulation of residues, debris, gunk build-up associated with oil or silicone lubricants.
- Non-Toxic non-hazardous protective films
- Withstands 400 hours of Military salt spray corrosion test
- Maintains a sustainable near new and perfect firearm condition
- Severely restricts abrasive and erosive wear action from burnt powders and oils contaminants
- Allows a soft cleaning patch to “push” out lead residues without using abrasive wire brushes
- Prevents build ups of contaminants compressed into metals by gas and load pressure
- Reduced resistance to contaminant build up offers sustainable shooting velocity and accuracy
- Greatly reduces or eliminates frequent gas port adjustments in semi-auto and automatic firearms

**A properly DynaGlide Plus® conditioned firearm will self clear to prevent debris build-up and fouling during multi-round shooting sessions.**



**Suggested Use** - (After an initial DynaGlide Plus® preconditioning or reconditioning session)  
 Apply DynaGlide Plus® into ejector, breach and gas port areas before shooting to establish, control and maintain a debris and foul free environment within your firearm. (Use enough DynaGlide Plus® formula to flush and displace debris from trapping areas)

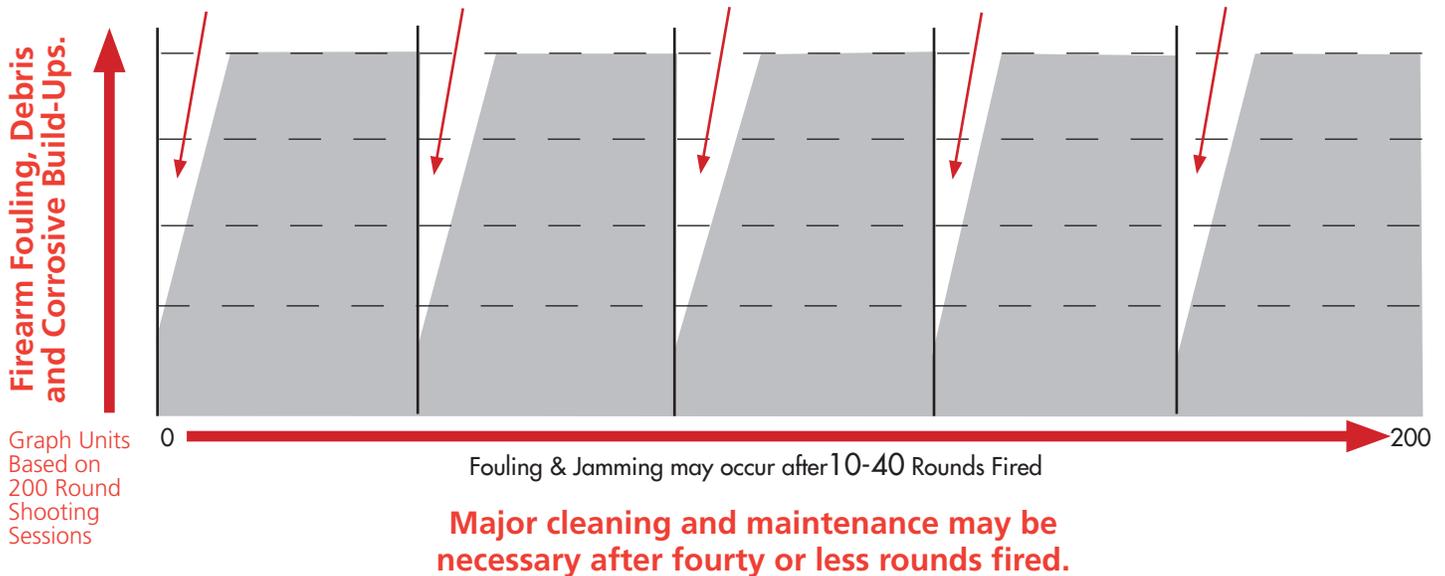
**To Maintain the Micro-Layered Tri-Boundary\* Dry-Film effect apply DynaGlide Plus®...**

- every 10-20 rounds for lead bullets.
- every 20-40 rounds for jacketed bullets.
- wipe down firearm as needed.
- NO after shooting clean-up necessary.

# Traditional Gun Cleaning and Maintenance.

Use of inefficient toxic solvents for cleaning and messy wet lubricants actually create a debris and moisture attracting environment that makes firearms prone to early fouling and jamming.

Typical messy and labor intensive cleaning and lubricating after **every** shooting sessions and before storage.



*Traditional "after shooting" cleaning solvents, wire brushes and wet lubricants used for cleaning and maintenance are messy, cause abrasive wear, and labor intensive in their use.*

## As referenced in Wikipedia, encyclopedia

\* Boundary lubrication (also called boundary film lubrication): The bodies come into closer contact at their asperities; the heat developed by the local pressures causes a condition which is called stick-slip and some asperities break off. At the elevated temperature and pressure conditions chemically reactive constituents of the lubricant react with the contact surface forming a highly resistant tenacious layer or film on the moving solid surfaces (boundary film) which is capable of supporting the load; thus major wear or breakdown is avoided. It is also defined as that regime of lubrication in which the load is carried by the surface asperities rather than by the lubricant. The lubricating film consists of more than one single layer.

### Three layers are distinguished:

- a physically adsorbed layer
- a chemically adsorbed layer, and
- a chemical reaction layer