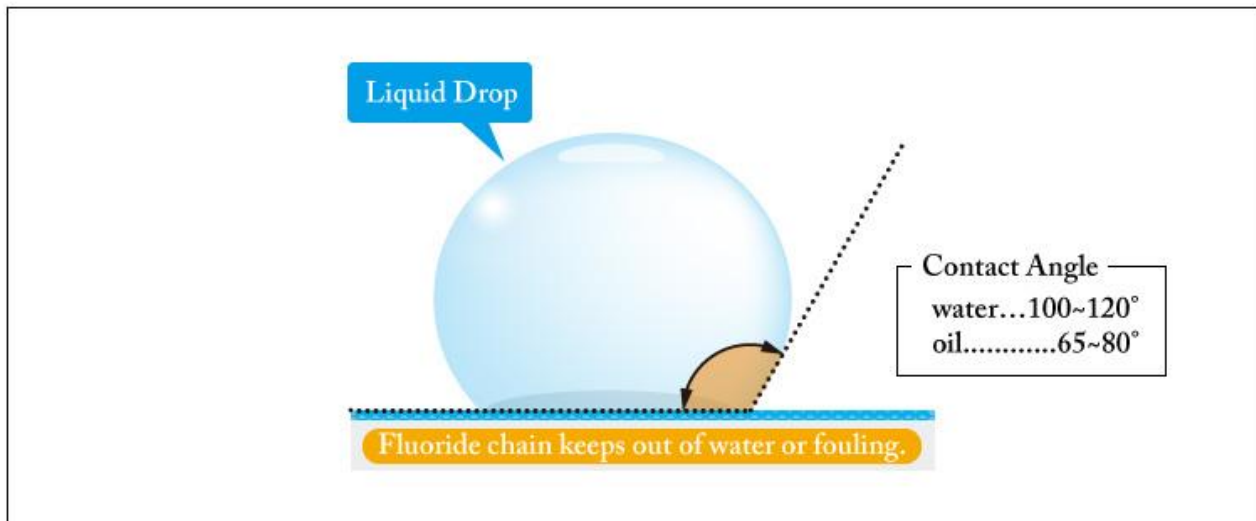


Water/Oil Repellent Coating Agent

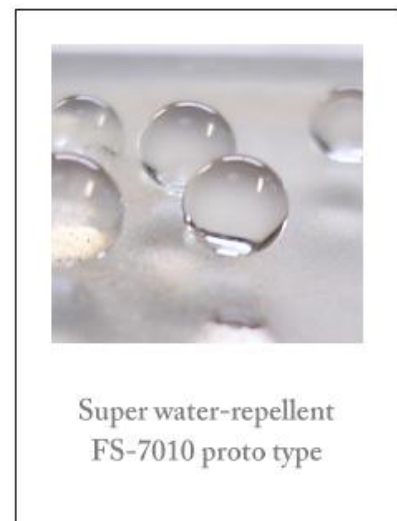
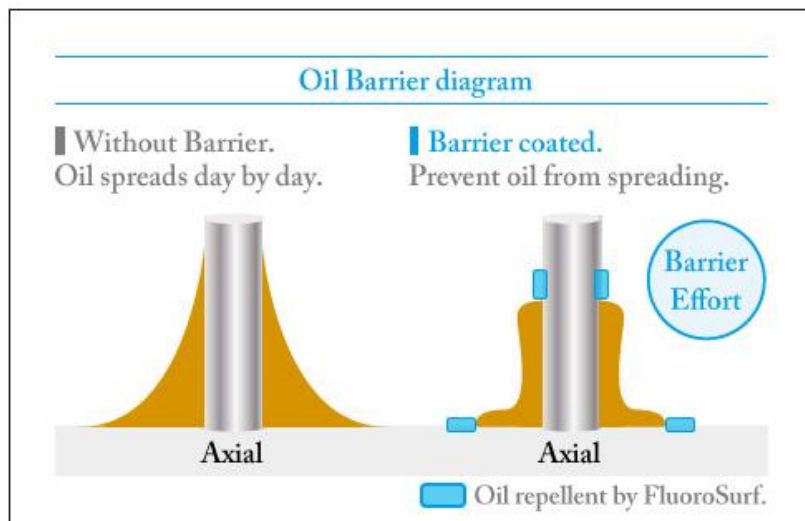
FluoroSurf®

Fluoride resin film formed on the surface repels water and oil strongly. It constitutes a barrier against grease (prevents its bleeding), prevents water and oil from diffusing or attaching and protects surfaces from fouling. The fluoride resin film provides diversified merits.

Water/oil repellent pattern diagram



Oil Barrier diagram



Examples of Oil / Water Repellent Applications



* Water/oil repelling and fingerprint prevention on touch panel

* Metal surface treatment/property modification

* Prevention of mini-motor bearing oil flow-out

* Oil barrier for HDD fluid dynamic bearing (FDB)

* Prevention of lubricating oil from moving to HDD magnetic head

* Prevention of oil from moving to DVD or optical lens

* Protection of electric contact from low molecular silicone

* Prevention of encapsulation resin from attaching to capacitor lead wire

* Prevention of flux from bleeding up to connector or electronic components

* Printed wiring board water repellent and moisture-proof coating

* Undiluted waterproof spray solution

* Water repelling and waterproofing of silk and cotton fiber

Water/Oil Repellent Applications

Features and Typical Line-UP of FLUOROSURF®

[High-Safe/Low-Toxicity Non-flammable Solvent type Water/Oil Repellent Treatment Coating Agent](#)

[Safe and Earth-Conscious Water/Oil Repellent Agent](#)

[Petroleum-based Solvent type providing superior cost performance](#)

Many choices are available for FLUOROSURF to meet your purposes.

Click name of required type to view detailed description.

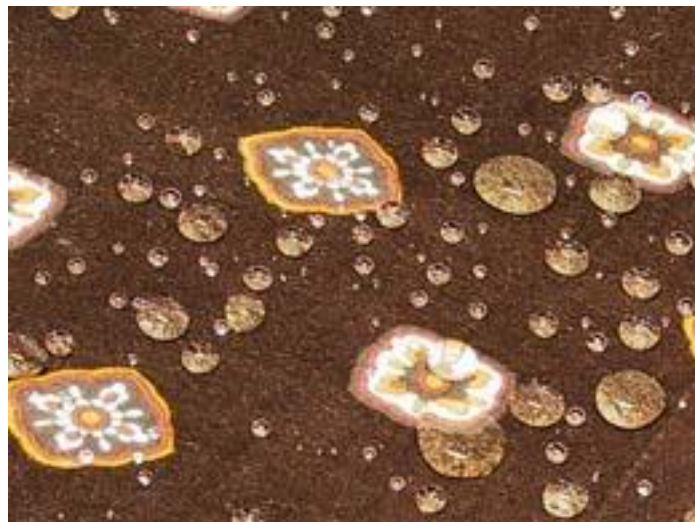
High-Safe/Low-Toxicity Non-flammable Solvent type Water/Oil Repellent Coating Agent.

- **■** Just coat the agent to acquire strong water/oil repellent properties. Soaking or bleeding of liquid or fouling can be prevented by the functional coating.
- **■** Non-flammable, low-toxicity solvent can be safely handled. This is not subject to the Fire Defense Law, Industrial Safety and Health Law and PRTR Law.
- **■** The agent dries at room temperature. You may select the drying time between 5 seconds and 30 minutes.
- **■** Mounted components or plastic parts are not affected.
- **■** Film thickness can be adjusted depending on the purpose. You may select resin concentration.
- **■** You may select non-flammable solvent according to your purposes (contact us for details).

Non flammable solvent type Main product Line-Up

Series	Typical Application / Feature	Conta (W
FS-1610	Oil Barrier, Resin barrier, Flux Barrier , High Contact Angle	1
FG-5083	Silane coupling . High Adhesion to glass and metals. Low friction	1
FG-5093	High Adhesion to metal surface, Low friction	1
FG-5040	Better hardness and adhesion.	1

Only representative FLUOROSURF products are presented here.
A diversity of products may be offered to meet any requirements. Please inquire of us about details.



Our products are chemical products for industrial use. They may have an influence on the health depending on handling manner. For this reason, our products or their samples are not offered for personal use. We would like you to accept such our intention..

Safe and Earth-Conscious Water- Soluble Repellent Agent.

- ■ The agent can be diluted to about 10 to 20 times with water or ethyl alcohol when using.
- ■ Film thickness can be adjusted by changing the dilution ratio.
- ■ The agent dries at ambient temperature, forms water and oil repellent film of fluorine resin and repels water and oil. This film may not soluble to water.
- ■ Antifouling function and bleeding grease/resin blocking function can be obtained.
- ■ The agent can be easily coated by dipping or using a brush.
- ■ As the resin concentration can be selected, film thickness can be adjusted according to purposes.
- ■ No surfactant is used and environmental contamination needs not be worried.

The product of water soluble type repellent

Product Model No.	Properties	Ionicity	Curing Temperature	Water Contact Angle	Resin Concentration
FS-6130	Low temperature treatment type	Anion	Not required	110°	10%

Petroleum-based Solvent type providing superior cost performance.

- ■Cheaper than non-flammable solvent type
- ■Main solvent is n-heptane and IPA of low impact on plastic and low toxic (**Not any substance subject to the PRTR Law is contained.**)
- ■Resin concentration can be changed to obtain film thickness you require.

Petroleum-based Solvent type Line Up

Product Model No.	Solvent	Film Hardness (Pencil Hardness)	Application / Feature
FS-2060 series	n-Heptane	Under B (Soft)	Better Cost Performance Cloths, Fabric, Leather, Paper, Wood Raw material of water proof spray for cloths, shoes. Flux barrier (wicking stopper)
FS-2050 series	IPA	9H(On Glass)	Silane coupling (Replacement of C8 Silane) Good adhesion to glass
FG-4610	n-Heptane Aceton (Mix)	B-HB	Repellent Water proof coating

Super water repellent coating agent FS-7010



- ■ Super water repellent coat of water-contact angle 160° , oil contact angle 90° , and water falling angle 2° can be easily obtained.
- ■ Film is white turbidity film which forms surface of “lotus leaf structure”.
- ■ Coating sample board is provided as a sample of this product.