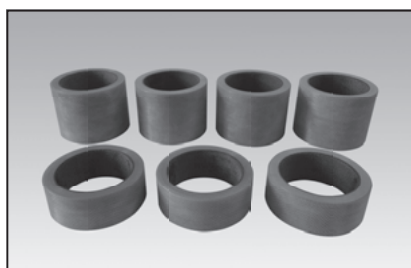


# Oiles Fiberflon OH Multi-layer polytetrafluoroethylene plastic bearings



This product is registered in the New Technology Information System (NETIS) managed by MLIT.  
 Technology name : Solid-lubricant dispersed bearing FIBERFLON OH/Registration No. : KT-130060-A (for water gates/underwater pumps)

## Feature

- This product can be used in air, water or seawater.
- Demonstrates superior wear resistance under micro-motion.
- Thanks to the dual structure of the sliding layer and backing material (FRP:glass fiber), this product offers load bearing characteristics equivalent to those of metal bearings.
- Easy dimensional setting due to a low swelling rate.
- Machining on the inner surface is possible.

## Service range

Lubrication condition	Dry
Service temperature range °C	-40~+120
Allowable max. pressure P N/mm <sup>2</sup> {kgf/cm <sup>2</sup> }	49 (100) {500 (1,020)}
Allowable max. velocity V m/s {m/min}	0.15 {9}
Allowable max. PV value N/mm <sup>2</sup> · m/s {kgf/cm <sup>2</sup> · m/min}	1.2 {734}

Condition: in atmosphere, bushing, shaft rotation.  
 The values in parentheses are static bearing pressures, which are the bearing pressures in applications with no motion or very small motion ( $\leq 0.0017$ m/s{0.1m/min}).

## Mechanical properties

Specific gravity	JIS K 6911	—	1.7	Hardness	JIS K 6911	—	HRM60
Tensile strength	JIS K 6911	N/mm <sup>2</sup> {kgf/mm <sup>2</sup> }	165 {16.8}	Izod impact strength (with notch)	JIS K 6911	J/m {kgf · cm/cm}	1,010 {103}
Compressive strength	JIS K 6911	N/mm <sup>2</sup> {kgf/mm <sup>2</sup> }	238 {24.3}	Co-efficient of linear expansion	ASTM D 696	$\times 10^{-5}$ °C <sup>-1</sup>	5 ~ 8
Flexural property	JIS K 6911	N/mm <sup>2</sup> {kgf/mm <sup>2</sup> }	127 {13.0}	Swelling rate	—	%	0.35

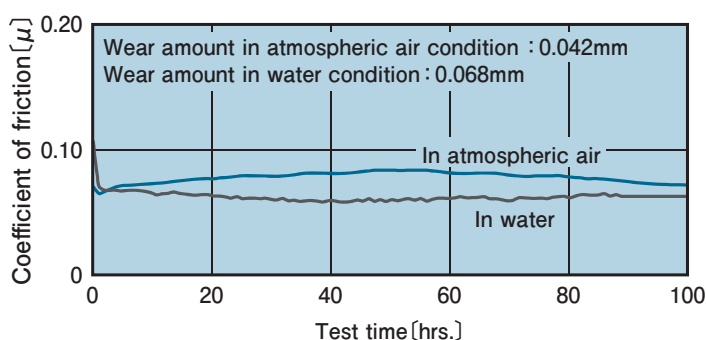
※ The values shown above are typical values, not the standard values.

## Test data

### Journal oscillation test

<Testing conditions>

Environment : In atmospheric air, In water  
 Bearing dimension :  $\phi 60 \times \phi 75 \times \ell 50$   
 Mating material : SUS403  
 Pressure : 24.5N/mm<sup>2</sup>  
 Velocity : 0.019m/s  
 Oscillating angle :  $\pm 45^\circ$   
 Oscillating cycle : 12cpm  
 Test time : 100hr  
 Lubrication : dry



### Journal oscillation test

<Testing conditions>

Environment : In atmospheric air, In water  
 Bearing dimension :  $\phi 60 \times \phi 75 \times \ell 50$   
 Mating material : SUS403  
 Pressure : 24.5N/mm<sup>2</sup>  
 Velocity : 0.0084m/s  
 Oscillating angle :  $\pm 2^\circ$   
 Oscillating cycle : 120cpm  
 Test time : 100hr  
 Lubrication : dry

