

Palladium Membrane for Hydrogen Purification

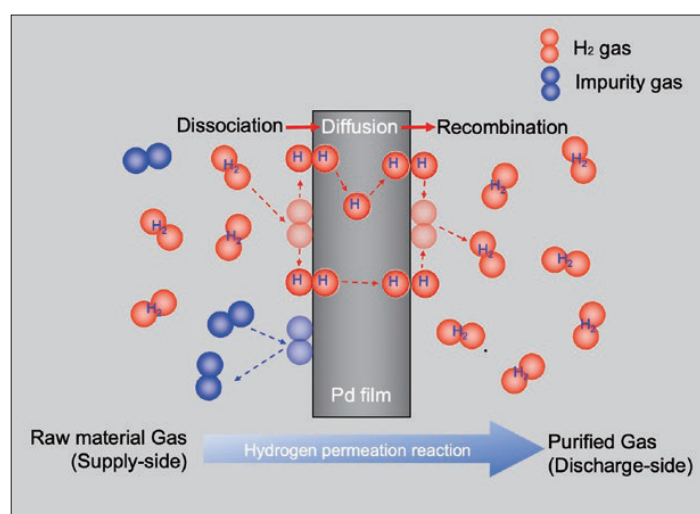
TANAKA PRECIOUS METALS manufactures high purity and pinhole-free membrane foils of Palladium and various Palladium alloys, using the state of the art processing technologies of precious metals.

Hydrogen Permeation Mechanism Using Palladium Membrane

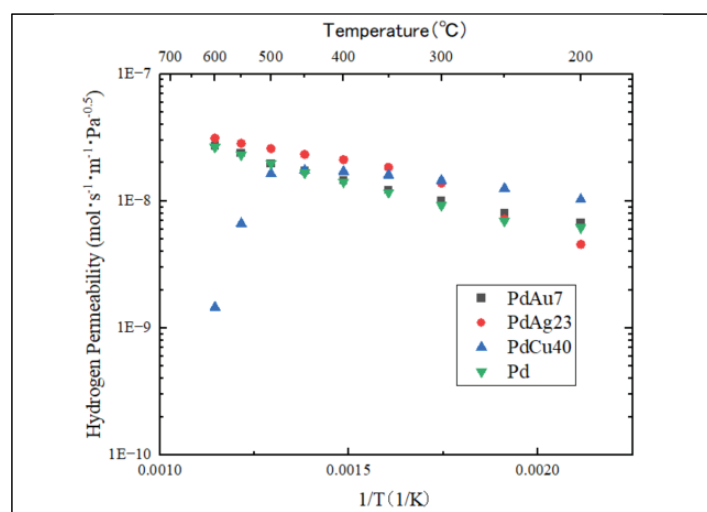
The properties of palladium allow only hydrogen to pass through selectively.

With this, separation of hydrogen from mixed gases through a palladium metal membrane becomes possible.

As the smallest possible atomic sieve, palladium is useful for producing high purity hydrogen for fuel cells and for generating ultrapure hydrogen required when manufacturing semiconductors and LEDs.



Hydrogen Permeability Measurement



Dimensional Capability

Alloy	Thickness	Width
Pd	>15μm	<120mm
Pd-Ag	>15μm	
Pd-Cu	>15μm	

Pd and Pd alloy Membrane

Alloy	Chemical Composition (wt%)
Pd	—
Pd-Ag	Ag 0~100
Pd-Cu	Cu 0~100
Pd-Au	Au 0~100

※Above composition is one of our product example. Please feel free to contact us about other Pd alloy compositions.

Inquiries

TANAKA PRECIOUS METAL TECHNOLOGIES Co., Ltd.
Tap here to inquire at: <https://tanaka-preciousmetals.com>
Scan QR code to send in your inquiries, or reach out to your appointed sales representative.

