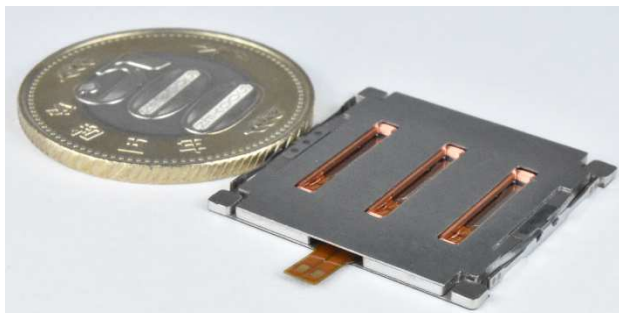


Released on May 09, 2024, in Kyoto, Japan

Nidec Precision Develops TapSense, the World’s Thinnest Linear Resonant Actuator

Nidec Precision Corporation (“Nidec Precision” or the “Company”), a member of Nidec Corporation’s group companies, announced today that it has developed **TapSense, the world’s thinnest linear resonant actuator***.



Nidec Precision’s TapSense

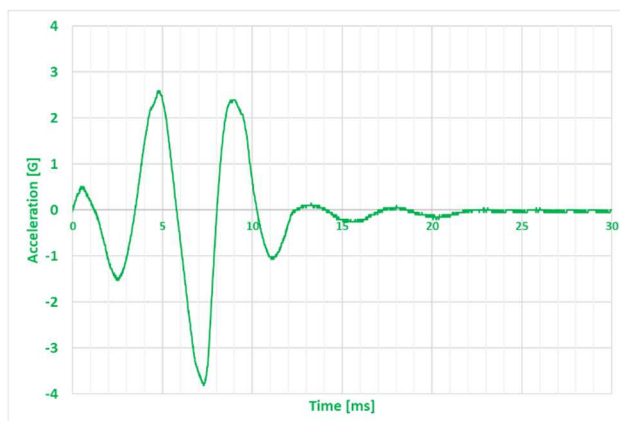
Nidec Precision developed TapSense, the world’s thinnest 1.4mm-thick linear resonant actuator by utilizing its precision manufacturing technology that the Company has, since its foundation, nurtured in the camera industry – and by designing from scratch a magnetic circuit optimum for a thin actuator. TapSense realizes tablet and notebook PCs and other digital terminals that are thinner than their conventional models.

With its excellent responsiveness and vibration force, TapSense can reproduce a crisp click feeling, while recreating a variety of tactile feedback, including the feeling of dial control. Additionally, its high responsiveness makes TapSense easier to control than conventional linear resonant actuators.

The cumulative shipments of the Nidec Group’s vibration motors exceeded 1.5 billion units at the end of March 2024, and these motors produced by Nidec’s technologies which enable light, thin, short, and small form factors with high efficiency and ease of control are highly valued by our customers.

As a member of the world’s leading comprehensive motor manufacturer, Nidec Precision stays committed to proposing revolutionary solutions that contribute to realizing a comfortable society.

Development specifications	
Size	25 x 25 x 1.4mm
Resonance frequency	200 Hz
OD voltage	7.0Vrms
OD waveform	3pulse sine wave
OD acceleration @40g jig	6.40 Gpp
Rise time (0 - 90%)	≤ 30ms
Fall time (100 - 10%)	≤ 20ms
Rated voltage	3.0Vrms
Rated current	360mA
Resistance value	8Ω



An example of vibration waveform

TapSense’s development specifications

*Data, from Nidec Precision’s research, as of May 01, 2024

For more details on the above product, please contact the email address: NPCJ-TAPSI@nidec.com
Sales Department II, Nidec Precision Corporation