

Dyson patent shows wash-dry of hands from same fixture

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(Phys.org)—Dyson, the British design and manufacturing company known for its vacuum cleaners, fans, and hand dryers, has yet another innovative cleaning design on the burner. This time Dyson has come up with the idea of providing a tap that washes and dries your hands from one and the same device. There would be no need to move away from the sink and use a hand towel if at home or to stand in line to wait for a free hand dryer at a public restroom. The idea is that a single faucet on



the sink can behave as air blower and water spout for cleansing hands. Dyson, a British company, filed the patent in the U.S. on May 17.

Sensors play a role in this invention, releasing water to clean your hands and recognizing when you place open palms under ducts that they are ready for a blast of air for drying. The patent filing proposes a "dualpurpose fixture for a sink or wash basin, incorporating both a water tap and a hand dryer. The water tap has a spout arranged to project over the basin of the sink, and the hand dryer incorporates two or more handdryer nozzles—at least one for each of a user's hands. The left-hand nozzle is located on the left-hand side of the spout and the right-hand nozzle is located on the right-hand side of the spout, specifically so that the spout acts as a dividing partition between the two hand-dryer nozzles. This encourages correct usage of the hand-dryer. The fixture may be fitted to a sink or wall-mounted above the sink."

Patent filings such as this quickly catch buzz because the Dyson name is associated with inventiveness and good engineering; James Dyson, after graduating from London's Royal College of Art, began designing gadgets and machines with an early milestone becoming the bagless vacuum cleaner that eventually became a UK best-seller. Dyson machines are in the permanent collections of the <u>Museum of Modern Art</u> and London's Victoria and Albert Museum, among other places.

As for drying machinery, Dyson engineers have been brainstorming better designs and technologies for hand drying, with their Airblade hand dryer. Energy efficiency and good hygiene are some of the promotion points driving the product. Dyson engineers, according to the company, and scientists spent three years developing, testing and refining the Airblade for drying hands. They quoted a study that said that paper towels and warm air hand dryers generate 70 percent or more carbon emissions than the Dyson Airblade hand dryer. Rather than warm air, the Dyson Airblade hand dryer uses sheets of cool cleaned air to scrape



water from hands. Air is forced through two apertures described as the width of an eyelash, creating sheets of <u>air</u> travelling at 400 mph. Water is scraped from hands in twelve seconds.

More information: <u>appft.uspto.gov/netacgi/nph-Pa</u>...

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