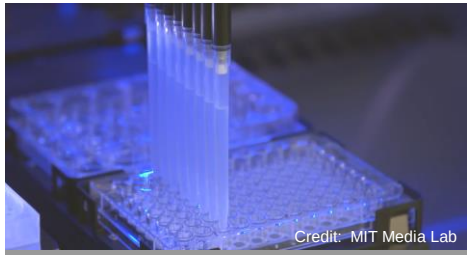
現有流體操控技術

微量流體的精准操控很重要但很困難

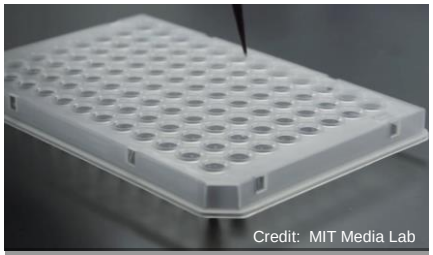
流體易變形可分割有粘性

基因編輯

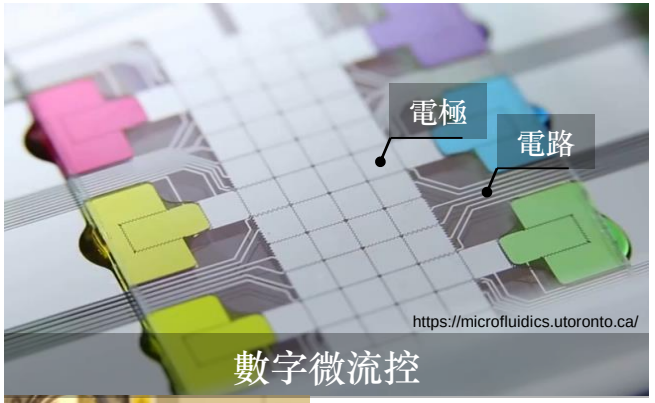
新冠檢測



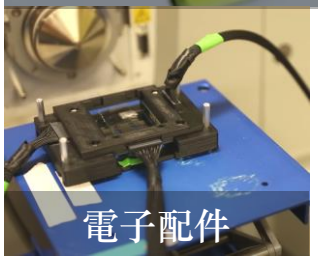
DNA提取



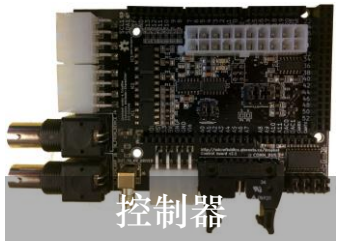
產生一次性塑料廢品



數字微流控



電子配件



控制器

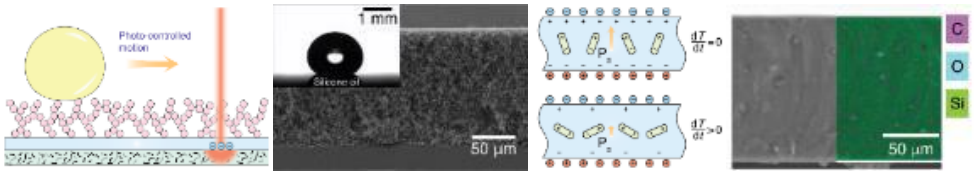
移液管

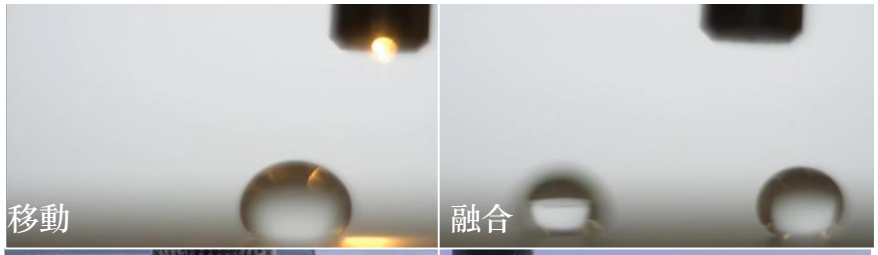
(殘留量大、流體體積大、手工重復操作)

數字微流控

(殘留量大、流體體積大類型少、電極/電子配件/操控復雜)

光控無損微流體操控器





四項基本功能

光控機器人

垂直爬升

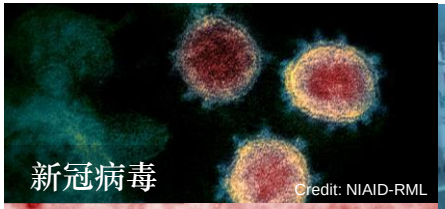
無殘留

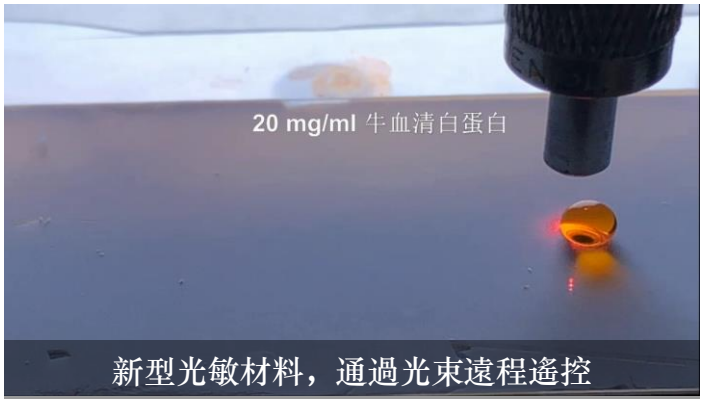
光控

適用不同液體類型/體積

Science Advances **6**: eabc 1693 (2020)

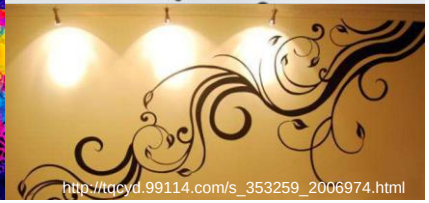
光控無損微流體操控器





降低醫療檢測風險

減少一次性塑料的使用



藝術裝飾

光控無損微流體操控器

Nanofluids Lab@HKU
精準操控不同液體在很多領域都至關重要
Precision manipulation of various liquids is essential in many fields
Reproduced from https://www.youtube.com/watch?v=z0NBsyhApvU

謝 謝

大學
校友
社會
政府
出版商
行業
媒體
投資方
Wang's Group @HKU
香港大學校友會
Hong Kong University Alumni Association
政府總部
Central Government Offices
nature
Cell
Science
AAAS
INDUSTRY 4.0
NEWS

微小流體，

無限可能！