

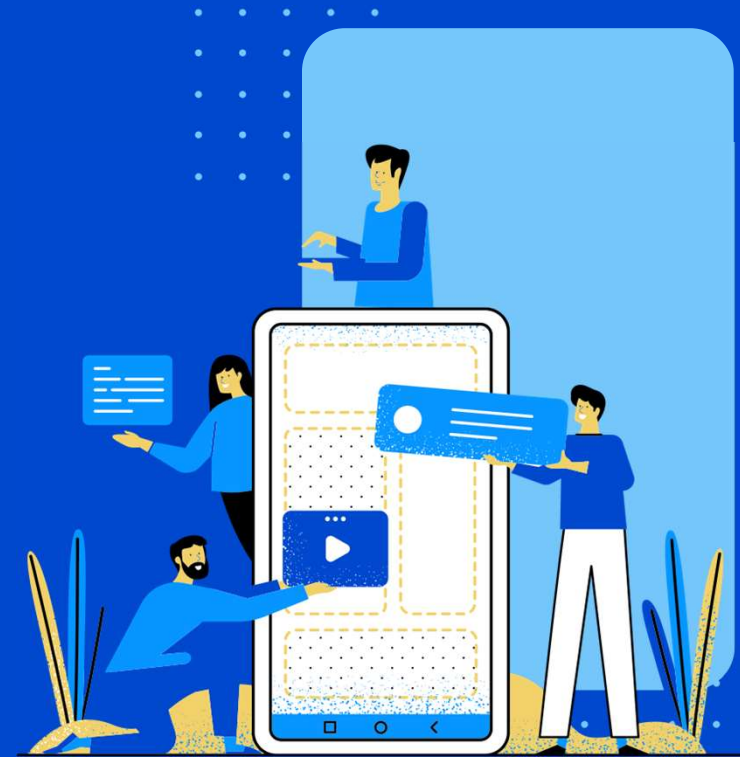
The clinical potential of point-of-care quantitative SpectroChip coupled with lateral flow immunoassay in COVID-19 pandemic

I-Jen Wang

¹Department of Pediatrics, Taipei Hospital, Ministry of Health and Welfare



INTRODUCTION



COVID-19 PANDEMIC





The Taiwan Model for Combating COVID-19

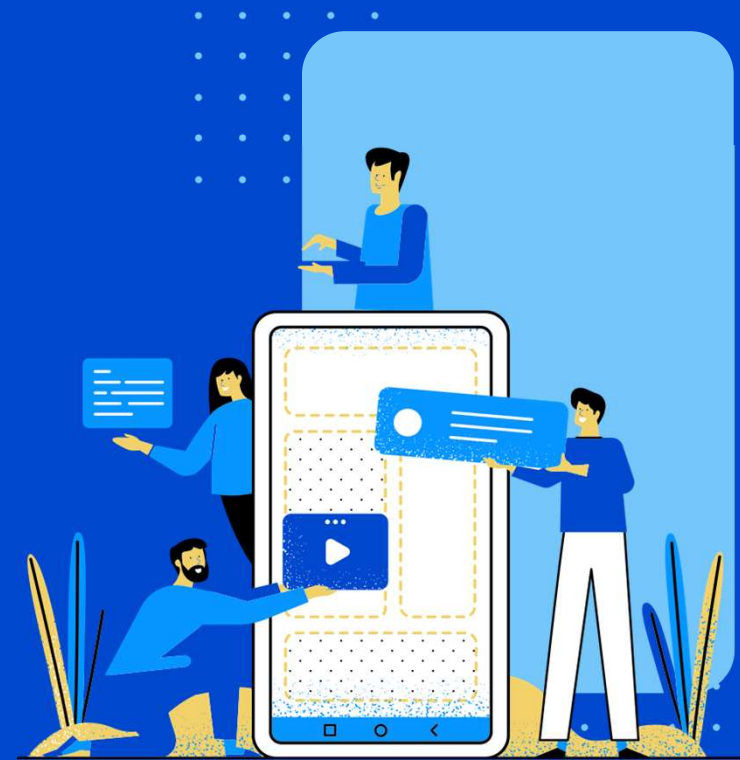


AIM

COVID-19 is the current grand global public health challenge.

- To development of rapid quantitative detection of antibodies.

METHODS



Subjects



Suspected COVID-19
(n=111)

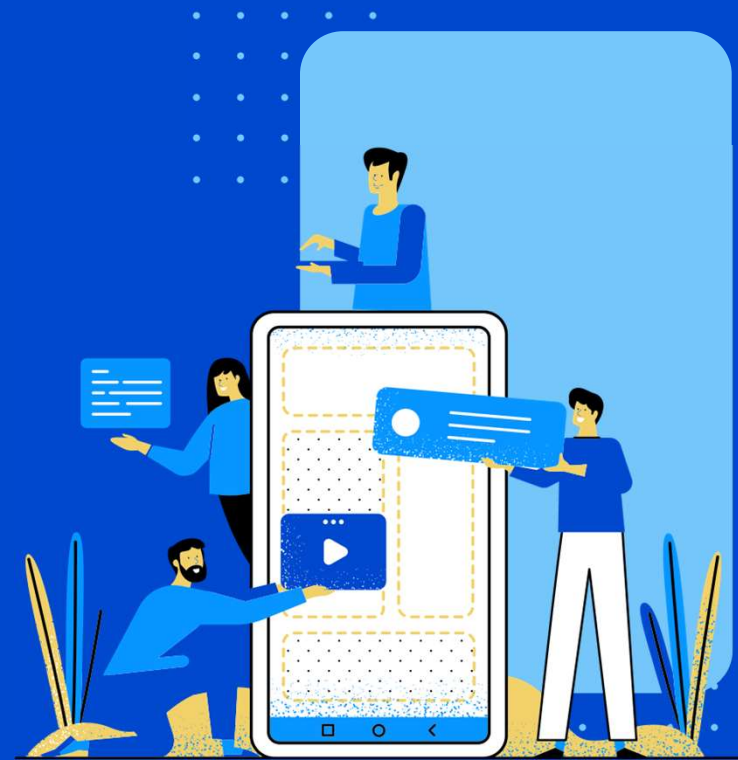


March to May 2020 in a hospital



Quickly produce results

RESULTS

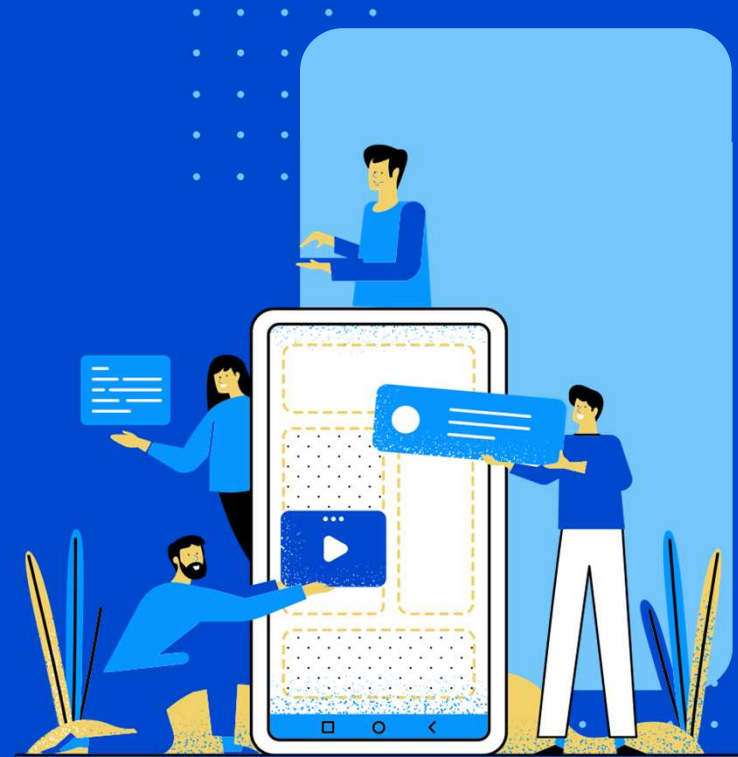


RESULTS

Table1. Essential demographic characteristics of participants

Characteristics	Confirmed, PCR(+) (N=12)	Suspected, PCR(-) (N=99)	P-value
Age (mean ± SD)	28.00±11.68	37.17±19.59	0.116
Male	6 (50.0%)	49 (49.5%)	0.974
Symptom			
Fever	6 (50.0%)	55 (55.6%)	0.765
Cough	4 (33.3%)	43 (43.4%)	0.504
Sore throat	4 (33.3%)	18 (18.2%)	0.214
Diarrhea	1 (8.3%)	13 (13.1%)	0.636

CONCLUSION



CONCLUSION

- The COVID-19 IgM / IgG antibody test kit qualitatively detects the presence of IgG and IgM antibodies together or separately
- The human immune system produces first antibodies “IgM” that have an immediate strength binding to the coronavirus. the IgG antibodies have a high binding affinity towards the virus, resulting in higher efficiency when fighting the virus.
- This new platform's extraordinary detection ability demonstrated clinical potential.



To fight this pandemic, it becomes quite significant to conduct rigorous and quick testing.

THANKS FOR LISTENING

