**Suggested data for worked example: Diagnostic Accuracy Calculator.**

I have not been able to find the diagnostic accuracy figures which the ‘Test and trace’ initiative is based upon. What I can work out from the government/PHE information is that the test is the ‘swab test’, so is a molecular test which will be sample for at any of the following locations:

* drive-through regional testing sites
* mobile testing units
* test kits delivered to your home
* hospital-based testing for NHS patients and staff
* dedicated testing centres in other care settings (for example, care homes)

In reality, this probably means that the assay is being done on a wide range of platforms, with many different kits, supplied with numerous combinations of consumables. Which makes it difficult to narrow this down to one test alone. Because of this I started looking at other sources…

**Meta-data from FINDDx**

I have looked to FindDx, who have been compiling data (in a Shiny app!) from laboratories which have carried out evaluations (some unpublished) of commercially available assays:

https://finddx.shinyapps.io/COVID19DxData/

I suggest that we use this as our hypothetical but realistic scenario from which to base the worked example. I filtered samples types to include: Pharyngeal, nasopharyngeal, oropharyngeal. I think the most likely sample type is oropharyngeal, but any of these are possible so have been included.

Sensitivity meta-analysis fixed effect = 73.94% [95%CI 70.81%-76.84%]

Sensitivity meta-analysis random effect = 88.3% [95%CI 84.02%-91.56%]

Specificity meta-analysis fixed *and* random effect = 93.64% [95%CI 91.78%-95.1%]

N (samples) = 2471

Included on the next page are plots for all of the studies included for sens/spec with 95% CI. The meta-analysis is the brown diamond.

**Clare** Please can you check if using fixed or random effect is most appropriate?

Footnote:

PHE have published (today!) a document which says, according to their investigations, 11 selected commercial molecular tests are equivalent in performance to the PHE assay (whatever that is…) <https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/889795/Assay_Validation_Situation_update_report.pdf>

A close up of a logo

Description automatically generated**A close up of a map

Description automatically generated**