

Supplementary file 6. Additional information relating to cost analysis

Table 1. Regression analysis on the number of FTE staff involved

Outcomes/ Control variables	FTE equivalent	FTE senior staff (Band 6 and above)	FTE non - senior staff (Band 5 and below)	FTE clinical staff	FTE non-clinical staff
Type of the service (CO@h=1; CVW=0)	2.29 (3.04)	0.73 (1.42)	1.56 (2.11)	1.73 (2.69)	0.58 (0.77)
Data submission mode (tech-enabled and analogue =1; analogue-only=0)	-2.91 (2.41)	-0.79 (1.13)	-2.12 (1.67)	-3.06 (2.14)	0.09 (0.61)
<i>(Large sites)</i>					
Very small sites	-7.46** (3.53)	-3.61** (1.65)	-3.85 (2.45)	-5.23 (3.13)	-2.27** (0.90)
Small sites	-7.23** (3.31)	-2.35 (1.55)	-4.88** (2.29)	-5.54 (2.93)	-1.74** (0.84)
Medium sites	-0.29 (3.65)	-0.75 (1.71)	0.46 (2.53)	-1.01 (3.24)	0.68 (0.93)
Constant	10.65*** (3.81)	4.80** (1.79)	5.85 (2.64)	8.28** (3.38)	2.43** (0.98)
No. of observations	35	35	35	35	35

Note: ***p < 0.01, **p < 0.05.

Reference categories in italics. Standard errors in brackets.

Table 2. Costs of CO@h and CVW services

Resources used for setting-up and running the programme	Total CO@h service						Tech-enabled with Analogue mode						Analogue-only mode					
	CO@h service			CVW service			CO@h service			CVW service			CO@home service			CVW service		
	Mean cost per site	10 th percentile	90 th percentile	Mean cost per site	10 th percentile	90 th percentile	Mean cost per site	10 th percentile	90 th percentile	Mean cost per site	10 th percentile	90 th percentile	Mean cost per sites	10 th percentile	90 th percentile	Mean cost per site	10 th percentile	90 th percentile
Setting-up costs																		
Staff costs	£59,617.9 (£26,058.5)	£7,619.9	£75,144.6	£9,338.0 (£2,993.3)	£832.0	£22,487.4	£38,632.4 (£10,410.7)	£7,886.6	£72,803.0	£9,710.7 (£5,554.9)	£1,217.6	£22,834.9	£115,579.3 (£93,429.4)	£6,916.6	£311,606.1	£9,018.5 (£3,347.1)	£897.4	£19,842.2
Non-staff costs																		
The tech-enabled platform	£77,937.9 (£20,812.3)	£3,790.7	£142,760.0	£32,712.4 (£16,859.4)	£3,161.1	£84,082.3	£77,937.9 (£20,812.3)	£3,790.7	£142,760.0	£32,712.4 (£16,859.4)	£3,161.1	£84,082.3	-	-	-	-	-	-
Thermometer	£449.8 (£273.3)	£0.0	£570.4	£122.7 (£56.7)	£0.0	£432.3	£292.4 (£224.3)	£0.0	£548.0	£142.2 (£90.0)	£0.0	£426.7	£869.4 (£836.2)	£0.0	£2,608.2	£106.0 (£77.9)	£0.0	£336.7
Other costs	£267.8 (£130.0)	£0.0	£1,395.8	£892.1 (£723.2)	£0.0	£1,573.2	£269.7 (£154.6)	£0.0	£979.2	£367.3 (£310.6)	£0.0	£1,068.2	£262.7 (£262.7)	£0.0	£788.0	£1,342.0 (£1,342.0)	£0.0	£3,757.5
Mean running costs																		
Cost per patient triaged	£351.8 (£73.7)	£67.6	£512.2	£581.8 (£139.9)	£74.4	£1,366.8	£343.4 (£83.8)	£78.8	£464.1	£567.0 (£208.1)	£129.0	£1,152.5	£374.1 (£165.2)	£68.9	£821.1	£594.5 (£204.1)	£130.1	£1,220.9
Cost per patient monitored	£527.5 (£110.5)	£101.4	£768.0	£599.1 (£144.0)	£76.6	£1,407.4	£514.9 (£125.6)	£118.2	£695.8	£583.9 (£214.3)	£132.8	£1,186.8	£560.9 (£247.8)	£103.2	£1,231.1	£612.1 (£210.2)	£134.0	£1,257.1

Source: Based on data provided by each site.

Note: Standard errors in brackets.

Table 3. Regression analysis on the mean running cost per patient

Control Variables	Coef.	Std. err.
Type of the service (CO@h=1; CVW=0)	-457.99**	(199.47)
Data submission mode (tech-enabled and analogue=1; analogue-only=0)	-34.15	(165.42)
FTE difference between the senior and the junior staff	24.75	(20.48)
Number of patients monitored	0.62***	(0.17)
Constant	529.07***	(140.47)
Number of observations	35	

Note: ***p < 0.01, **p < 0.05.

Table 4. Time spent on activities for each CO@h and CVW service and data submission mode

Activity	Mean time (in minutes) per patient regardless of the mode used (n=3 sites)		Mean time (in minutes) per patient – CO@h service (n=2)		Mean time (in minutes) per patient – CVW service (n=1)		Mean time (in minutes) per patient – CO@h and CVW service (n=1)	
	Tech-enabled and analogue	Analogue-only	Tech-enabled and analogue	Analogue-only	Tech-enabled and analogue	Analogue-only	Tech-enabled and analogue	Analogue-only
Patient triage/risk stratification	18[2]	5[1]	30[1]	.[0]	20[1]	.[0]	5[1]	5[1]
Patient information and training	30[3]	30[2]	32.5[2]	35[1]	30[1]	.[0]	25[1]	25[1]
Patient monitoring	68[3]	72.5[2]	101.5[2]	140[1]	175[1]	.[0]	1.5[1]	5[1]
Patient data reporting	12[3]	4[2]	17[2]	6[1]	70[1]	.[0]	2[1]	2[1]
Work involved in flagging deterioration *	15[1]	16.25[2]	.[0]	17.5[1]	90[1]	.[0]	15[1]	15[1]
Work involved in escalation processes *	10[2]	9.5[2]	9[1]	9[1]	20[1]	.[0]	10[1]	10[1]
Patient discharge from ward *	16 [2]	16[2]	22[1]	22[1]	15[1]	.[0]	10[1]	10[1]

Note: The number in brackets is the number of the valid responses from sites (non-missing) that have been used for the calculation of the average time.

*) time spent only among the patients who require this activity.

Table 5. Mean costs per patient (in £) spent for each activity

Mean cost in £	Activity							Total
	Patient triage/risk stratification	Patient information & training	Patient monitoring	Patient data reporting	Work involved in flagging deterioration *	Work involved in escalation processes *	Patient discharge from ward *	
Tech-enabled with analogue	£14.4	£15.5	£35.1	£13.8	£12.0	£11.5	£12.8	£115.1
Analogue-only	£4.0	£15.5	£37.5	£4.6	£13.0	£10.9	£12.8	£98.3

Note: * time spent only among the patients who require this activity.