

EmERGE

mHealth platform



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TITLE:

EmERGE: feasibility and uptake of a co-designed digital health supported pathway of care for people living with medically stable HIV.

AUTHORS:

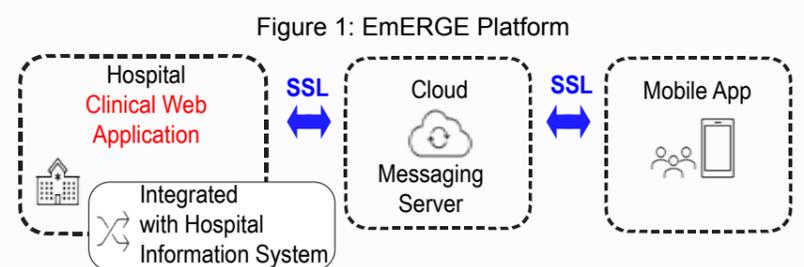
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BACKGROUND:

New digital approaches to clinical management of HIV have potential to manage capacity whilst maintaining excellent clinical outcomes. This study examined the feasibility and uptake of a digital care pathway for people living with medically stable HIV at five clinical sites in Europe.

MATERIALS AND METHODS:

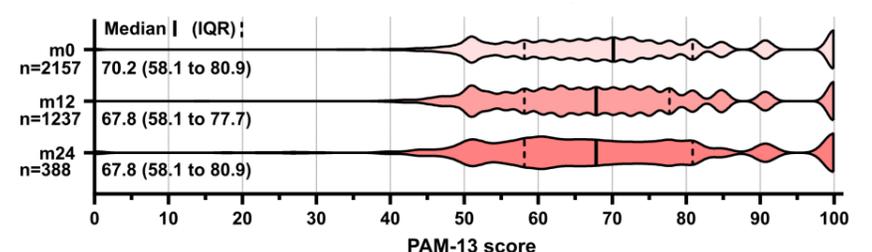
The EmERGE platform (Figure 1) was co-designed, [1,2] developed and integrated into the IT systems at the five sites. Participants were seen once a year by their clinician with interim results checked, encrypted and pushed through to an app on their mobile phone. The 'MAST' framework of evaluation [3] was adopted- a pre-post study design was used with clinical and questionnaire data collected including: viral load outcomes; serious adverse events (SAEs); patient activation [PAM-13]; adherence [M-MASRI]; quality of life [EQ-5D-5L; PROQOL-HIV]; system usability score [SUS] and patient experience at baseline [m0], 12 [m12] and 24 months [m24]. Changes over time were estimated using mixed effects regression models.



RESULTS:

The GDPR compliant EmERGE platform was successfully integrated at all sites during 2017. **2251** participants (mean 23.1% of clinic cohorts) were enrolled and followed up for between 12-30 months each. Demographics were representative of clinic cohorts: 91% male (2048/2251); 71% MSM (1598/2251); 27.9% aged over 50 (629/2251); 20.4% (460/2251) non-national at site. Virological outcomes remained excellent (10/2251 with confirmed VL>50; none lost to clinical follow-up); no SAEs related to the pathway were reported. Patients were highly activated [Figure 2], no clinically important change was observed in PAM-13 score; adjusted average continuous PAM-13 score at m12 compared to m0 0.95 (99%CI:-2.10 to 0.19); m24 compared to m0 -1.19 (99%CI: -3.32 to 0.93). Median self-reported adherence was 100% at each time point. Health related quality of life was generally good although pain/discomfort and anxiety/depression were common (up to 34% & 44% respectively at m12) on EQ-5D-5L. Stigma was the lowest scoring domain of PROQOL-HIV. The usability of the platform was excellent [SUS score 85 at m12 and m24]; **94.6% would recommend EmERGE to a friend.**

Figure 2: Overall PAM-13 score by time point



CONCLUSIONS:

This co-designed digital health supported pathway offers a secure, safe, feasible and acceptable option for routine care to people living with medically stable HIV: providing individuals with access to their data and other information whilst helping clinics to manage capacity.

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