Integra

Strengthening the evidence base for integrating HIV and SRH services

Measuring the costs and efficiency of integrated SRH/HIV Services

Integration for Impact Conference
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Population Council

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Background

- The integration of HIV and sexual reproductive health services (SRH) aims to improve the delivery of both HIV & SRH services

- Limited evidence around integration of health services supports efforts to integrate services

- However, high quality economic evidence of efficiency gains remains scarce, and therefore an urgent need for country studies to evaluate costs and efficiency as integration moves forward.

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How integration influences the costs of HIV and SRH services

- Integration of HIV and SRH services may yield efficiency gains through:
  - Economies of scale:
    - Increased coverage of services
    - better utilization of existing capital and human resources
    - shared management & procurement systems that yield volume cost savings
  - Economies of scope:
    - shared use of common infrastructure, overheads & certain 'indivisible' operational costs such as specialized equipment and staff

- Resulting cost savings and efficiency gains are achieved through expansion of services to clients who would otherwise not receive a service.

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Framework for economic analysis

- Health provider perspective – excludes costs to clients accessing services
- Full cost analysis in 41 health facilities for two periods (2008/2009 and 2010/2011) to determine changes in unit costs and efficiency resulting from integration
- Input components
  - Capital: building, equipment, staff training.
  - Recurrent: personnel salaries, drugs, diagnostics, supplies
- Activities costed
  - SRH - FP, PNC, cervical cancer screening
  - HIV - HCT, STI management and HIV treatment/care
- Unit cost per client visit estimated as the measure of technical efficiency

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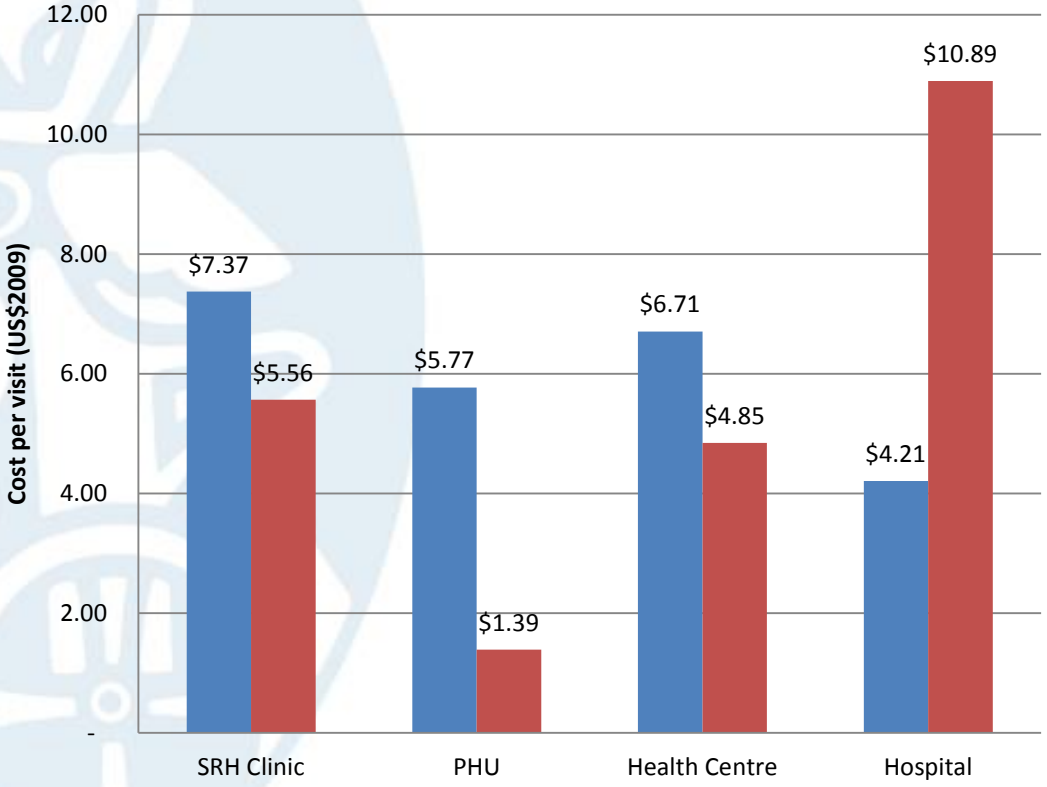
Unit costs per PITC/VCT client C&T: Swaziland



PITC	
Average cost per client C&T	US$ 7.79
Average cost per client diagnosed HIV positive	US$ 47.85

VCT	
Average cost per client C&T	US$ 9.44
Average cost per client diagnosed HIV positive	US$ 45.46

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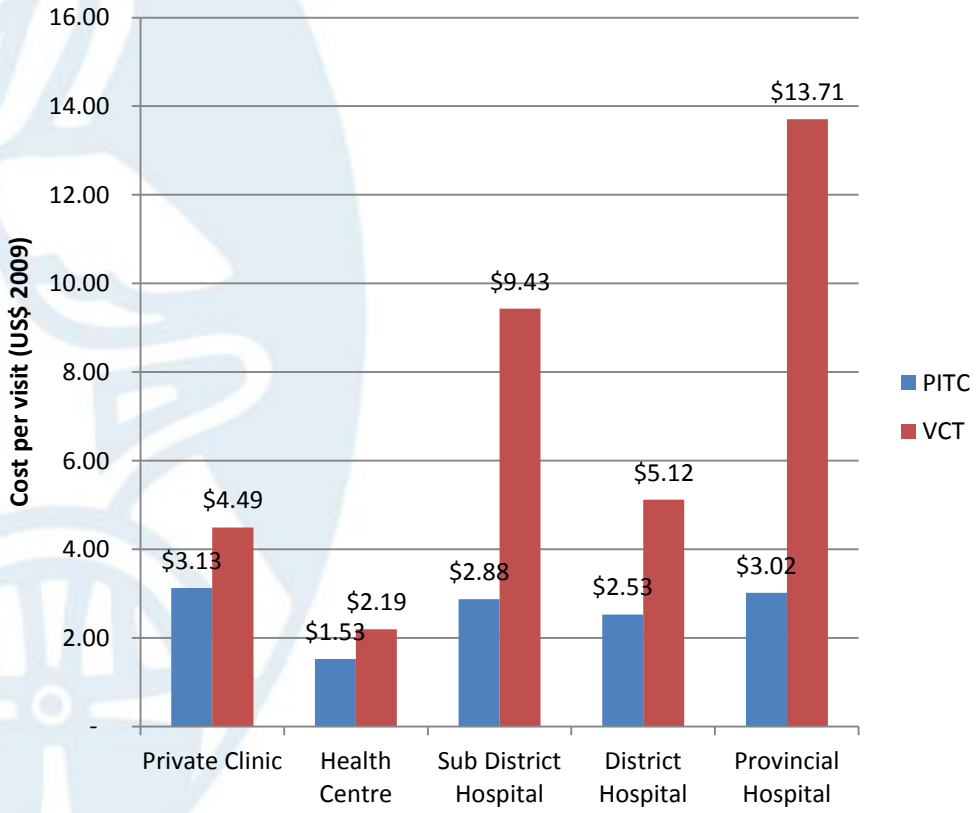
Unit costs per PITC/VCT client C&T: Kenya



PITC	
Average cost per client C&T	US$ 5.71
Average cost per client diagnosed HIV positive	US$ 46.96

VCT	
Average cost per client C&T	US$ 8.27
Average cost per client diagnosed HIV positive	US$ 110.32

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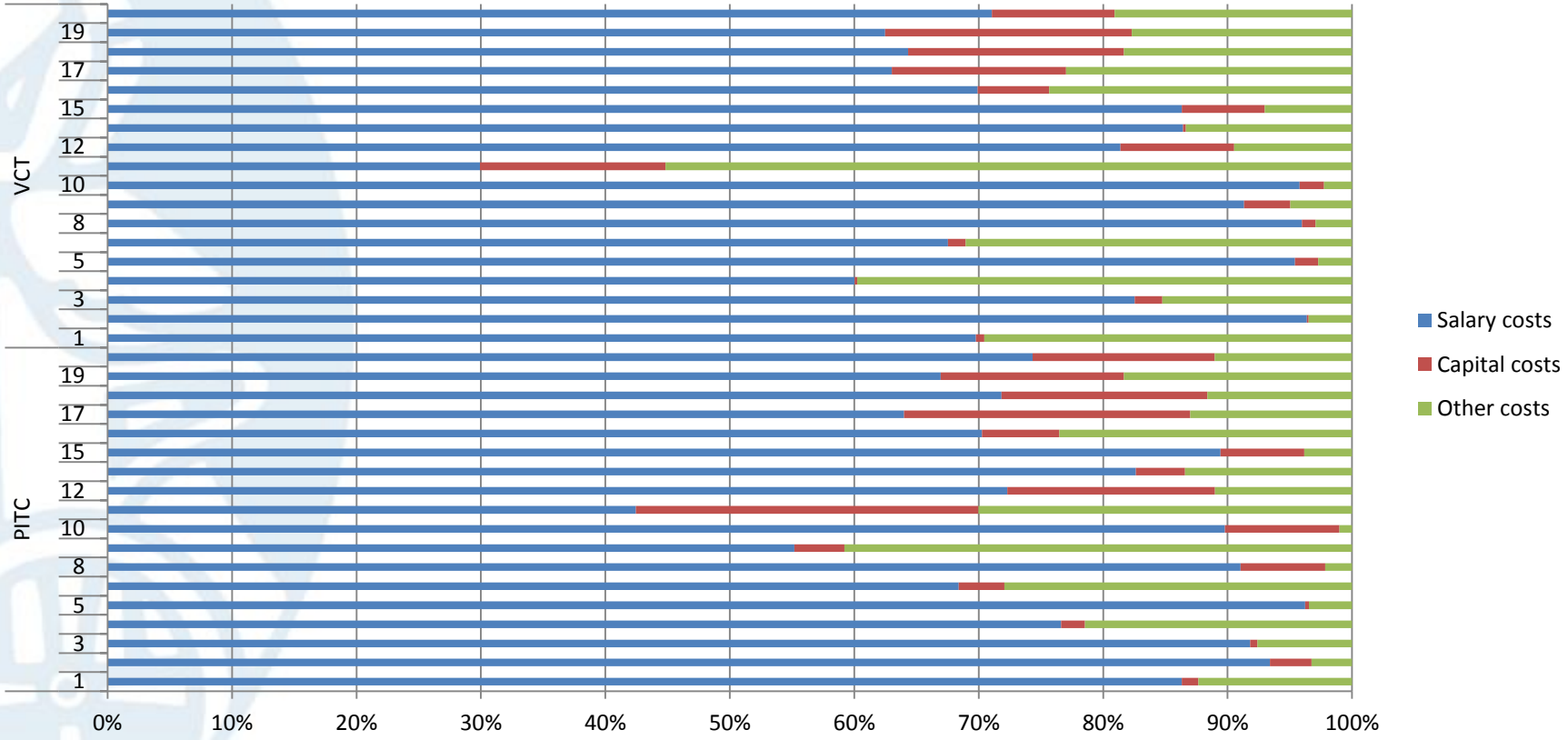
Unit cost breakdown by input type - Kenya



- Staff salary costs make up a significant proportion of total costs across both integrated and non integrated HCT (30% to 95%)

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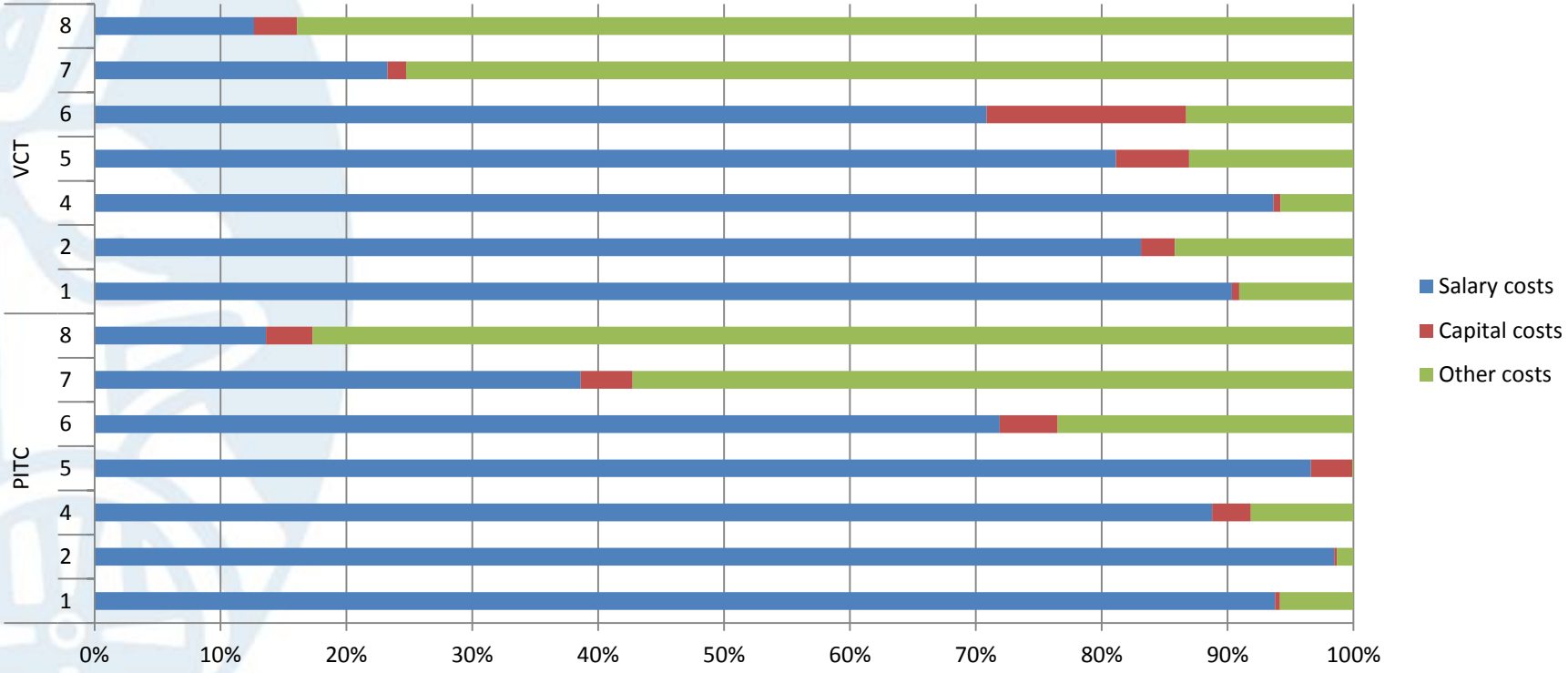
Unit cost breakdown by input type - Swaziland



- Staff salary costs are the main cost driver accounting for a significant proportion of total costs across all services (15% to 95%)

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What are the main areas of efficiency gain from Integration?

- Large variation in unit costs per visit across facilities can be explained largely by human resource and fixed capital resource utilisation

- Utilisation of human resources and fixed capital resources are measured as:
  - Staff workload - measured by the number of services provided per clinical staff FTE per day
  - Intensity of use of capital resources - measured by number of services provided per square foot of space available.

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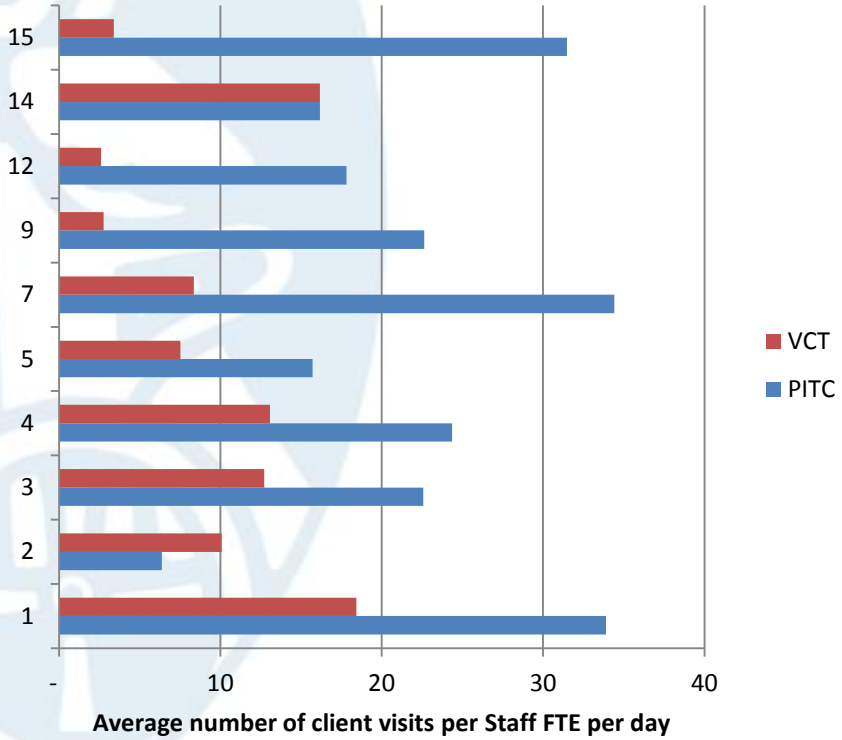
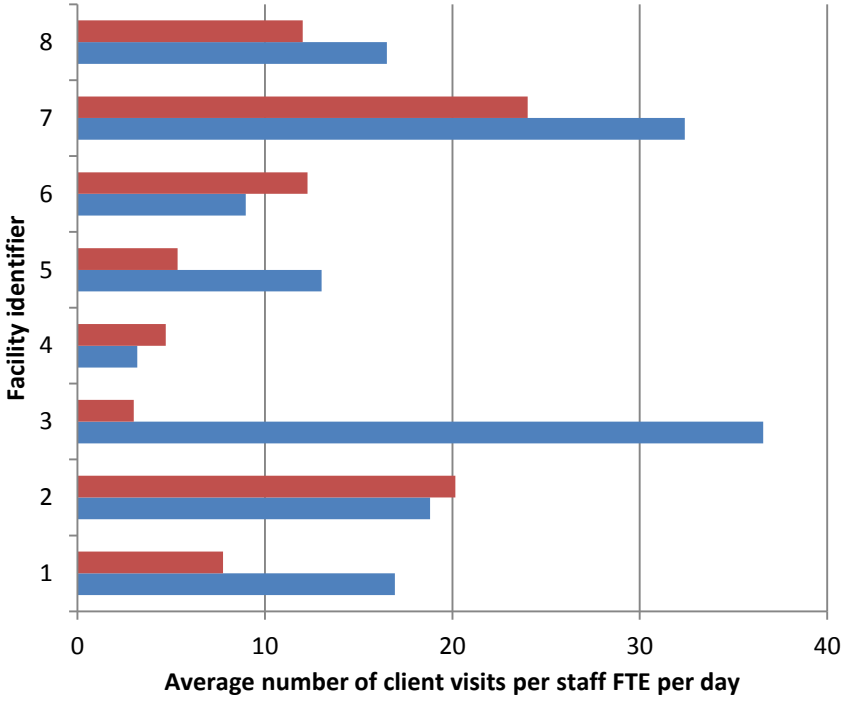
Variation in staff workload across Integra project health facilities

Kenya

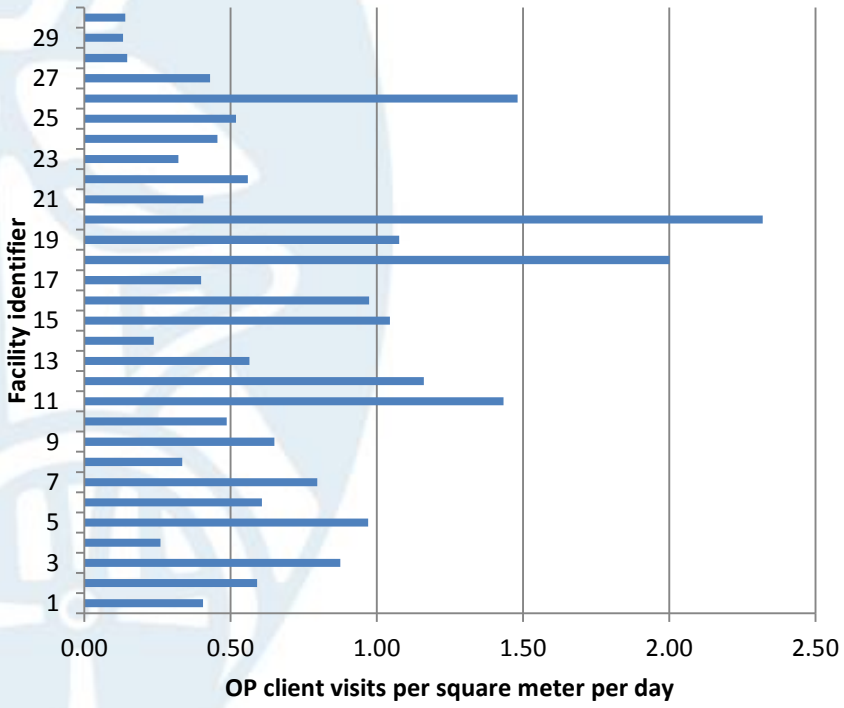


Swaziland

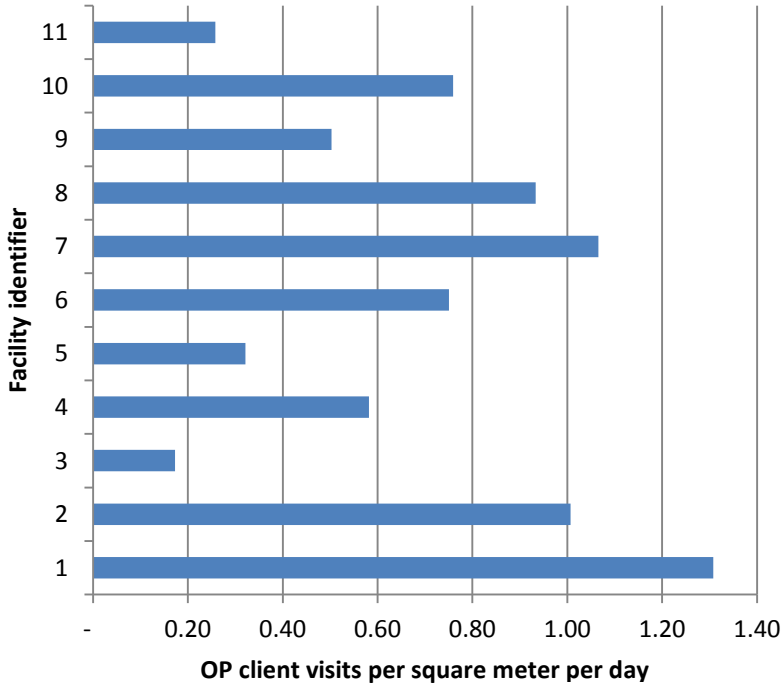


Variation in capital resource use across Integra project health facilities

Intensity of use of space - Kenya



Intensity of use of space - Swaziland



Summary of findings

- Scope for integration to improve the efficiency of SRH/HIV interventions by increasing numbers of clients and facilitating more efficient use of staff and capital resources
- While unit costs of integrated services may be lower, it is important to also take into account effectiveness and desirability of services from clients perspective
- Where demand for HIV services is low, thought should be placed on ways of either better locating stand-alone services or to adding more services to stand-alone sites, to ensure that staff are used to a maximum
- Care should be taken not to expand integrated services where services are already overstretched, unless additional staffing can be made available

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Next Steps

- Analysis of endline costs to determine changes in unit costs per visit, human and capital resource utilisation resulting from integration and explain variation in costs

- Use of non parametric data envelopment analysis to estimate technical efficiency of health facilities providing integrated HIV and SRH services incorporating quality of care measures

  - estimation of the output oriented technical efficiency scores for each facility using DEA
  - description of the variation in efficiency across the health facilities and explore the causes of variation in efficiency across study sites
  - verification of presence of economies of scope and scale

- Application of an index of integration developed to measure and account for actual degree of integration at each facility level in an econometric analysis to determine the impact of integration on the costs and efficiency of HIV and SRH services

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