Introduction: In 2013, ACP and CECity launched the Genesis Registry™ (Genesis), a national specialized clinical registry that serves as a central platform linking clinical data to performance measurement, value-based payment, performance reporting requirements, and quality improvement (QI). Genesis was built on a cloud-based registry platform developed by CECity. The registry was approved by CMS as a Qualified Clinical Data Registry (QCDR) for Physician Quality Reporting System (PQRS) reporting in 2014, with 24 electronic measures (e-measures).

Methods: Genesis supports fully automated data integration through CECity’s ImpaQt Gateway™, which allows for the continuous (e.g., daily) feed of clinical data from electronic health records (EHRs) and other data sources into the registry. This enables Genesis to support not only traditional registry functionality, but also near real-time population health and performance management. Genesis uses standardized data formats – Consolidated Clinical Document Architecture (C-CDA) or Quality Reporting Document Architecture (QRDA) – for the exchange of data from EHRs. Genesis provides performance feedback reports to participating providers, including performance measure scores, comparison to benchmarks, peer-to-peer comparison, patient care gap analysis, and identification of patient outliers. ACP and CECity are working to partner with a variety of organizations including health systems, large physician group practices (50-100 providers or more), and EHR systems to enroll in the registry.

Results: 12,000 providers have enrolled in Genesis to date. Clinical data submitted for these providers includes over 7 million patients. Automated clinical data exchange is being successfully achieved with multiple clinical partners, including EHR vendors (e.g., Athenahealth) and clinical data warehouse providers through health systems. Genesis is currently being used by clinicians and practices to satisfy Meaningful Use (MU) Stage 2 requirements for Specialized Registry data submission. The majority of providers have a minimum of five measures calculated from their EHR data feeds, including: diabetes measures (high blood pressure control and hemoglobin A1c poor control), hypertension (improvement in blood pressure), pneumonia vaccination for older adults, Body Mass Index (BMI) screening and follow-up, chlamydia screening for women, and colorectal cancer screening.

Conclusions/Discussions ACP and CECity have successfully launched a QI registry for Internal Medicine that demonstrates the ability to exchange clinical data with EHRs and other digital healthcare systems, and to scale enrollment of providers into the registry. In its first year, Genesis successfully enrolled clinicians from EHRs and several health systems, helping clinicians to meet MU requirements. Genesis was resubmitted for QCDR approval in 2015 with an expanded PQRS e-measure set. The registry provides a rich data resource for performance measure feedback and QI and has the potential to be used for research and analysis. To help drive QI, ACP and CECity have indexed educational materials to performance measures to link Genesis registry participants to targeted interventions.