

The Office of the National Coordinator for
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Health Information Exchange Capability among U.S. Office-Based Physicians 2011

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- Many potential benefits of robust health information exchange
- Historically, widespread exchange hindered by many barriers
- HITECH designed to support greater exchange
- Little information available to gauge progress
 - Previous studies of HIO participation
 - Little data on capability to exchange clinical data via other mechanisms

- Provide national estimates of physician capability to exchange health information
- Assess variation in exchange capability:
 - Across states
 - By physician and practice characteristics
 - By EHR vendor

- National Ambulatory Medical Care Survey 2011 Electronic Health Record Supplement
- Mail survey designed to measure adoption and Meaningful Use of EHRs, including health information exchange
- Sample expanded in 2010 to support state-level estimates

At main practice location, does physician have computerized capability to exchange:

Pharmacy data

- Send prescriptions electronically

Lab data

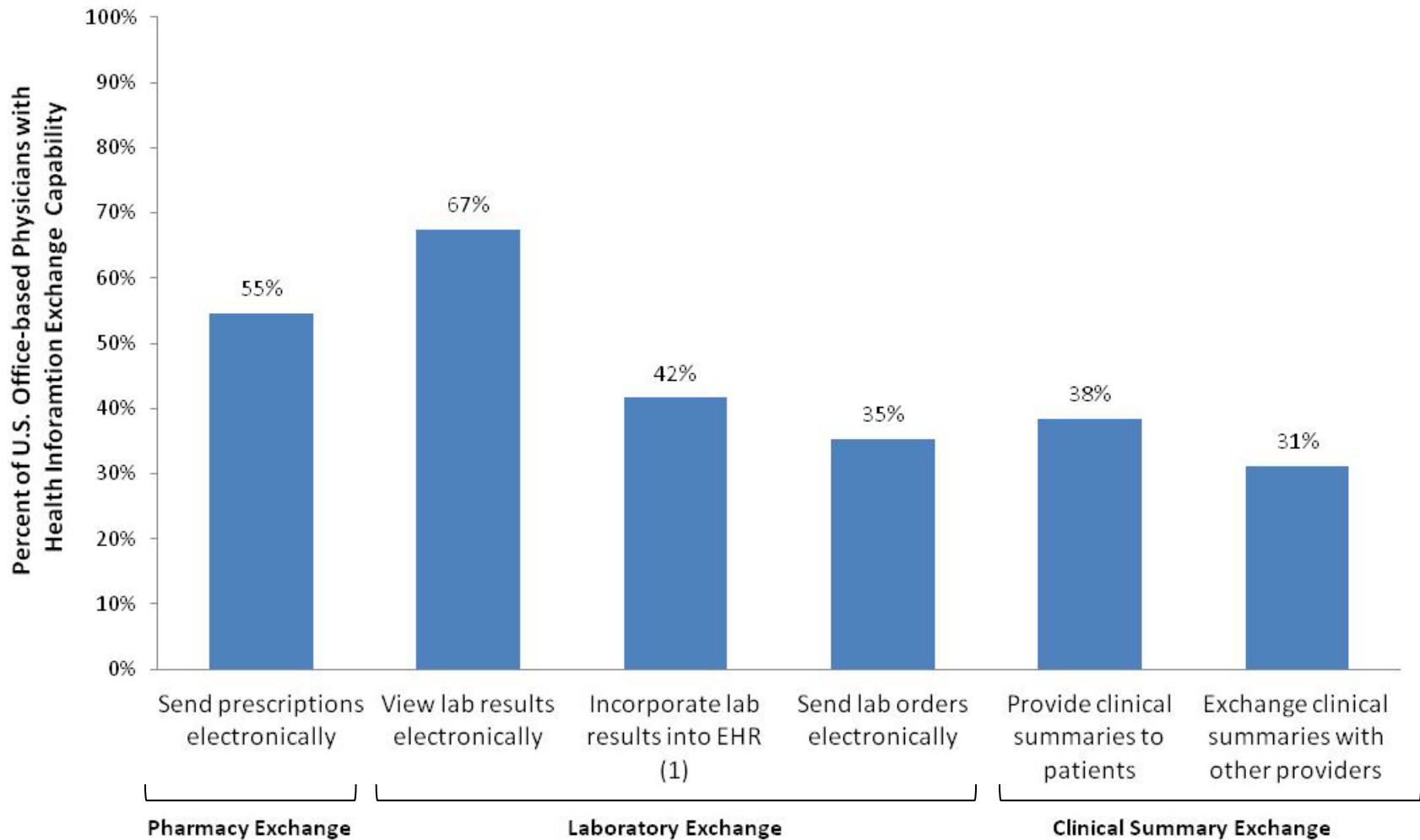
- View lab results electronically
- Incorporate lab results into EHR
- Send lab orders electronically

Clinical summaries

- Provide clinical summaries to patients
- Exchange clinical summaries with other providers*

*For this measure, the survey asks physicians whether they are actively exchanging clinical summaries with other providers. For all other measures, the survey asks physicians whether they have computerized capability to perform the activity.

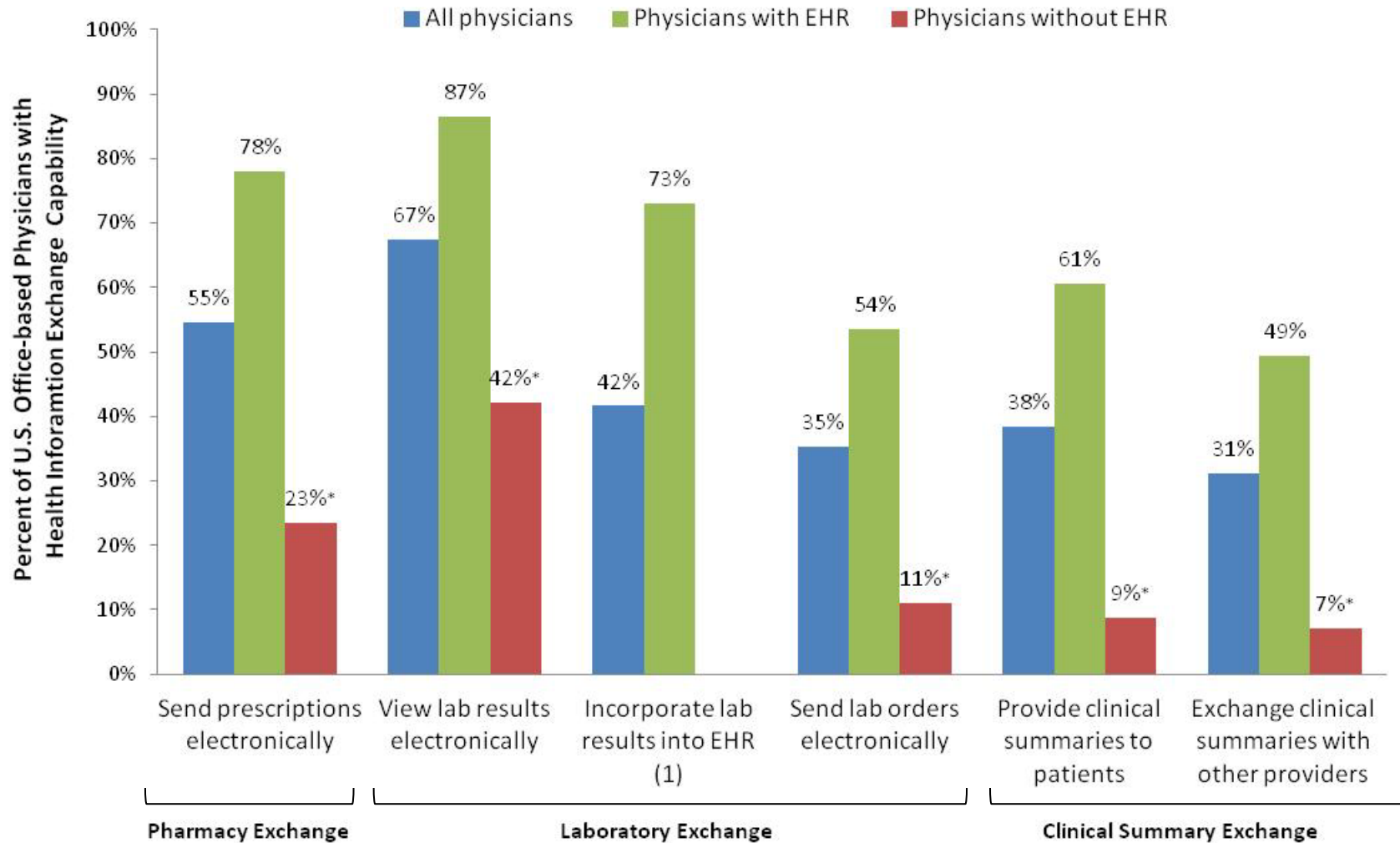
Health information exchange capability among U.S. office-based physicians



Note: (1) Assumes physicians without EHR lack capability to incorporate lab results.

Source: NAMCS Electronic Medical Records (EMR) Supplement, 2011

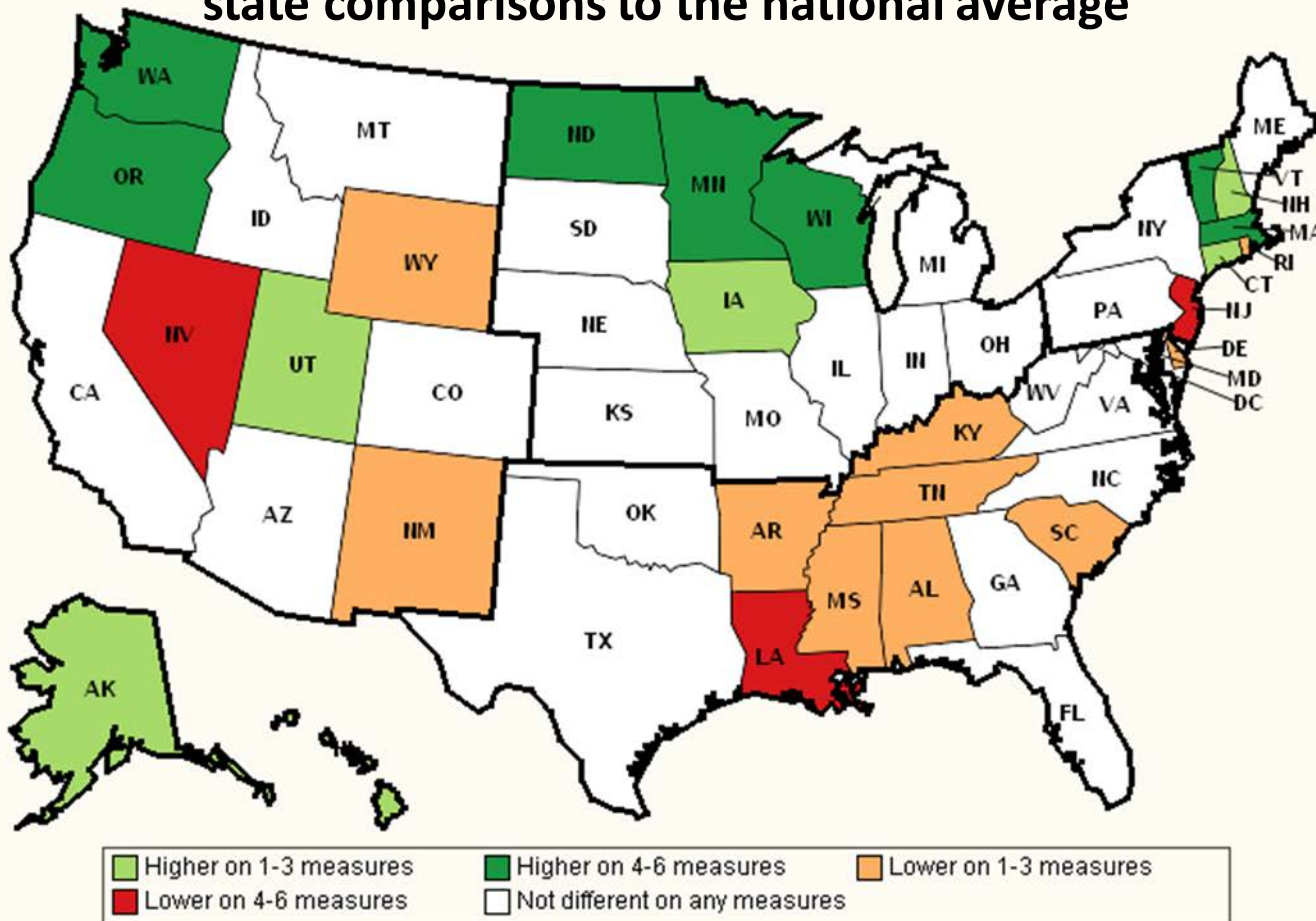
Health information exchange capability among U.S. office-based physicians



Note: (1) Assumes physicians without EHR lack capability to incorporate lab results. *Significantly different from physicians with EHR at $p < 0.001$. **Source:** NAMCS Electronic Medical Records (EMR) Supplement, 2011

State variation in health information exchange capability

Health information exchange capability among office-based physicians: state comparisons to the national average



Note: Shading based on the number of the following health information exchange measures for which the state is significantly different from the national average at $p < 0.05$: the share of physicians with computerized capability to (1) send prescriptions electronically, (2) view lab results electronically, (3) incorporated lab results into the EHR, (4) send lab orders electronically, (5) provide clinical summaries to patients, and (6) exchange clinical summaries with other providers.

In multivariate analyses

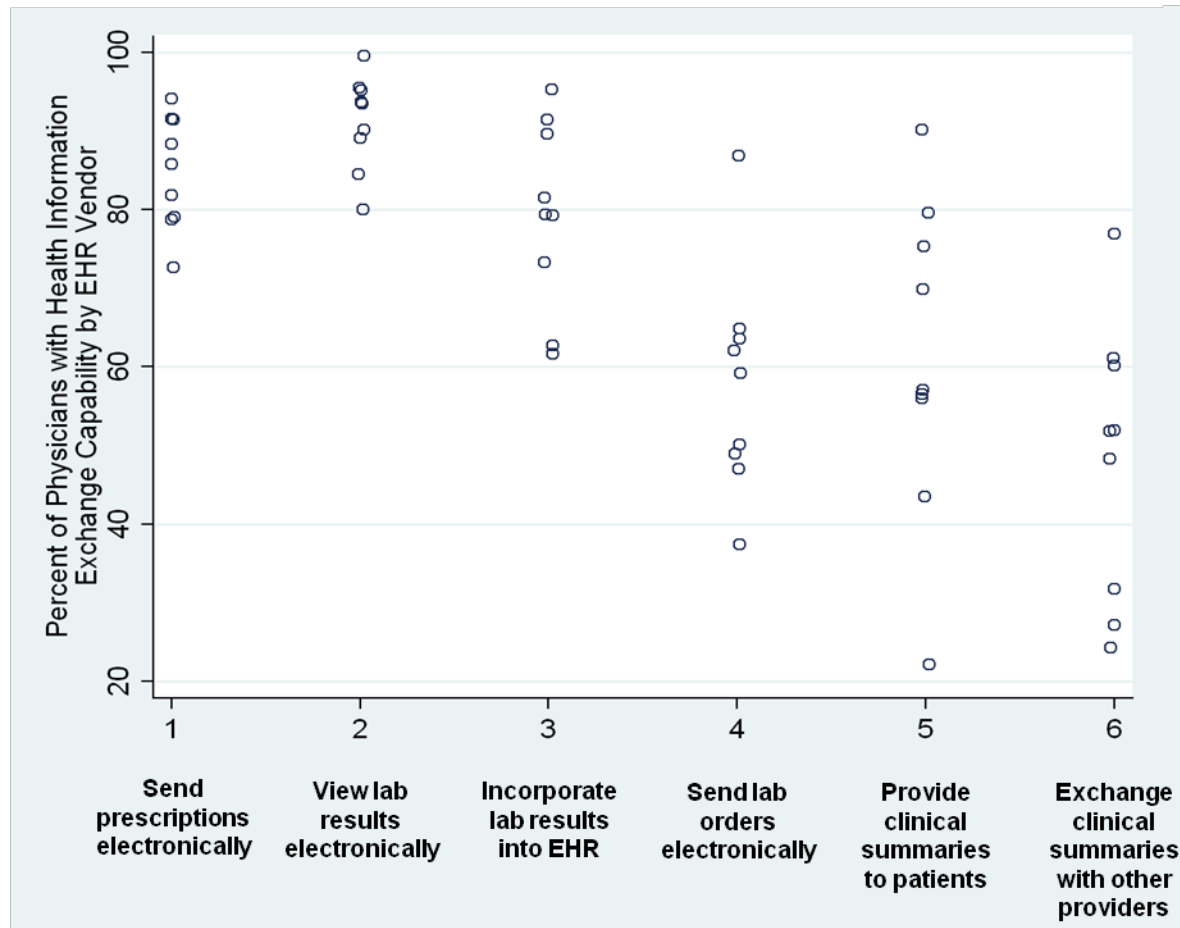
- EHR adoption was strongest predictor of exchange capability

Other significant predictors:

- Primary care specialty
- Practice size
- HMO ownership

Note: Results based on probit regression analysis controlling for physician age, specialty, practice type (single specialty or multi-specialty), practice size, practice ownership, metropolitan status, and EHR adoption status.

Variation in health information exchange capability by EHR vendor



Notes: Each circle represents the EHR vendor's percent of physicians with health information exchange capability, conditional on EHR use (i.e., a vendor-specific rate of exchange capability). Limited to EHR vendors (n=9) with at least 1% market share.

- Baseline for measuring progress:
 - Majority of physicians have capability to exchange lab and pharmacy data
 - About one-third can exchange clinical summaries with patients or other providers
 - Substantial variation by state and some physician characteristics
- EHRs could serve as a primary means for exchange of clinical information
 - But variation in capabilities across EHRs

- NAMCS provides valuable detail about exchange capability and activity
 - Expanded content forthcoming in 2012 & 2013
- Actively used by researchers, policy makers, and program evaluators
 - For example, ONC State HIE Program