

Empowering Smarter Authentication and Fraud Decisioning in an Evolving Digital Landscape

The digital economy is fast becoming the dominant economy, driving a digital transformation that has changed consumer interactions from location-centric and in-person to predominantly digital, and increasingly global.

Meanwhile, the threat of cybercrime grows; data breaches continue to proliferate and identity credentials are widely available on the dark web. Sophisticated cyber attacks are bypassing traditional security defenses by mimicking trusted user behavior. Static identity assessment methods alone are therefore no longer effective in verifying a person's real identity. The solution lies in understanding the digital DNA of users and their unique online footprint that can knit together trusted digital identities that fraudsters can't fake.

Understanding Entities Connected to Digital Identity with LexID® Digital, Powered by Global Shared Intelligence

Provides businesses with the ability to harness intelligence related to devices, locations, identities and past behaviors across the global network in order to accurately distinguish between trusted and fraudulent behavior. LexID® Digital extends this near real-time risk-based authentication with a dynamically matched or created identifier.

The LexisNexis® Digital Identity Network® is built from crowdsourced intelligence from approximately 35 billion global transactions each year including logins, payments, and new account creations. This provides a wealth of cross-industry intelligence which is leveraged by LexID® Digital.

LexID® Digital has the following benefits:

- Bridges online and offline data elements for each transacting user
- Goes beyond just device-based analysis and groups various other entities based on complex associations formed between events
- Consistently identifies a person irrespective of changes in devices, locations or behavior. Intelligence from the LexisNexis® Digital Identity Network® helps reliably recognize the same returning user behind multiple devices, email addresses, physical addresses and account names.

Building LexID® Digital Identifiers

LexID® Digital comprises three components that operationalize intelligence from LexisNexis® Digital Identity Network®:

- **A Unique Digital Identifier:** A tokenized and unique identifier based on global shared intelligence from LexisNexis® Digital Identity Network®. This identifier is dynamically matched or created based on each individual transaction; the LexID® Digital engine takes care of merging previously disparate digital identifiers in real time. This identifier is available in LexisNexis® ThreatMetrix®, for example to find transactions that are related (based on associations and linkages) not just from the organization's own data but from the entire global network.
- **A Confidence Score:** This pertains to the authenticity of a user. The score gives the likelihood of a current event being associated with an identity known to the LexisNexis® Digital Identity Network®: Various entities defining a global digital user, for example SmartID and ExactID, phone number, email address and credit card hash, are considered in light of the current event. These include a blend of entities that a user may not change for years (phone number for example) and entities that a user may change very frequently (shipping address, credit card for example). All these entities are dynamically updated in the network as a digital identity evolves over time. LexisNexis® ThreatMetrix® machine learning algorithm is then used to match event-specific entities with the entities linked to a digital Identifier within the network. This then creates a confidence score for the transacting user.
- **A Visualization Graph:** For businesses to effectively operationalize LexID® Digital, associations and linkages between the digital identifier and entities are visualized in two different ways: a Digital ID view and a Relationships view. This gives organizations a unique, global view without compromising privacy or anonymity of other organizations within the network.

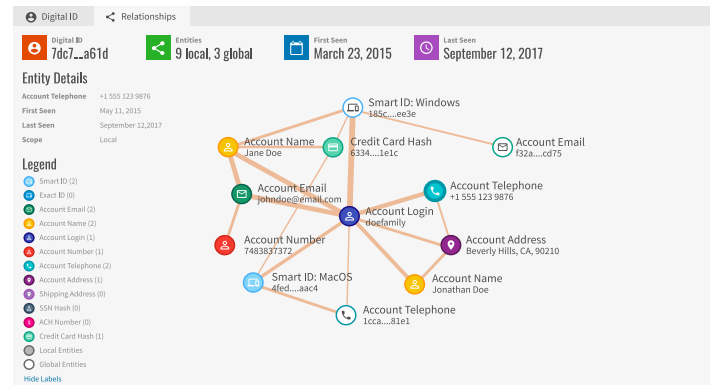
Value of LexID® Digital to Digital Businesses

- **Accept More Business with Global Customer Recognition:** Helps businesses accept more cross-border transactions by offering a global customer view.
- **Reduce Fraud with Identity Assurance:** Detects use of synthetic and stolen identities. Low confidence scores can suggest identity credentials being used fraudulently/out of prior context.
- **Behavior Insights:** With LexID® Digital, entities associated with a user and interactions amongst those entities seen in LexisNexis® Digital Identity Network® are demonstrated in a pictorial way. This makes operationalizing insights and intelligence from the Digital Identity Network more streamlined.
- **Comprehensive Customer View:** With LexID® Digital, businesses get a 360-degree view of customer identity by merging offline and online data; they can visually monitor customer behavior (trusted, suspicious or fraudulent) based on past events. In addition, businesses can track customer behavior not only within their own organization but also within the entire LexisNexis® Digital Identity Network® of over 5,000 global organizations. This helps to drive financial inclusion for users with little credit history.
- **Reduce Challenge Rates:** Helps consistently recognize trusted returning users, reducing the friction and cost associated with step-ups.
- **Accelerating Manual Reviews:** The LexID® Digital visualizations are a great tool for simplifying and accelerating the manual review process, reducing friction and false positives.

The Digital ID View shows a digital identifier and entities associated with it such as email address, Exact IDs, Smart IDs, credit card hash, account logins, account telephone numbers etc.



The Relationships View goes a level deeper and demonstrates the relationships between all the above entities based on the past events and behavior of the transacting user. Width of the links denotes how often a combination of entities is seen together in the past, with respect to a ThreatMatrix ID.



Entities local to an organization can be decrypted for review while the global entities remain tokenized



LexisNexis® Risk Solutions Advantage

- **An Unparalleled Network:** The LexisNexis® Digital Identity Network® protects billions of unique online accounts using intelligence harnessed from around 3 billion monthly transactions.
- **Privacy by Design:** LexisNexis® Risk Solutions is unique in its ability to solve the challenge of providing dynamic risk assessment of identities while maintaining data privacy through the use of tokenization.
- **An Integrated Approach to Authentication:** Flexibly incorporate real-time event and session data, third-party signals and global intelligence into a single smart authentication framework, to deliver a consistent and low-friction experience with reduced challenge rates.
- **Advanced Behavioral Analytics and A Clear-Box Approach to Machine Learning:** Smart analytics analyzes dynamic user behavior to build more accurate, yet simpler, risk models. The result is a competitive edge in customer experience with reduced false positives, while maintaining the lowest possible fraud levels.

For more information, call 866.528.0780 or visit risk.lexisnexis.com/FIM-EN



About LexisNexis Risk Solutions

LexisNexis Risk Solutions harnesses the power of data and advanced analytics to provide insights that help businesses and governmental entities reduce risk and improve decisions to benefit people around the globe. We provide data and technology solutions for a wide range of industries including insurance, financial services, healthcare and government. Headquartered in metro Atlanta, Georgia, we have offices throughout the world and are part of RELX Group (LSE: REL/NYSE: RELX), a global provider of information and analytics for professional and business customers across industries. RELX is a FTSE 100 company and is based in London. For more information, please visit www.risk.lexisnexis.com, and www.relx.com.

About ThreatMetrix

ThreatMetrix®, A LexisNexis® Risk Solutions Company, empowers the global economy to grow profitably and securely without compromise. With deep insight into 1.4 billion tokenized digital identities, LexID® Digital delivers the intelligence behind 110 million daily authentication and trust decisions, to differentiate legitimate customers from fraudsters in near real-time.