Framework for Grant Oversight

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Federal Audit Executive Council

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Overview

- RATB Grant Fraud Focus Group

- Federal Government Oversight

- Forensic Techniques to Identify Anomalies

- Grant Process: Identifying Key Systems

- Forensic Framework and Grant Risk

Grant Fraud Focus Group

- Chartered by the Recovery Accountability and Transparency Board

- To Develop a Framework for Grants Oversight
  - Similar to DOD guide for contingency contracting
  - Will promote more automated techniques
  - Guide to be available in early 2011

- Focus is to Improve Grant Oversight
  - Better ways to identify problem grantees
  - Standardize grant audit and investigative efforts

- Members are Auditors, Investigators, and Attorneys
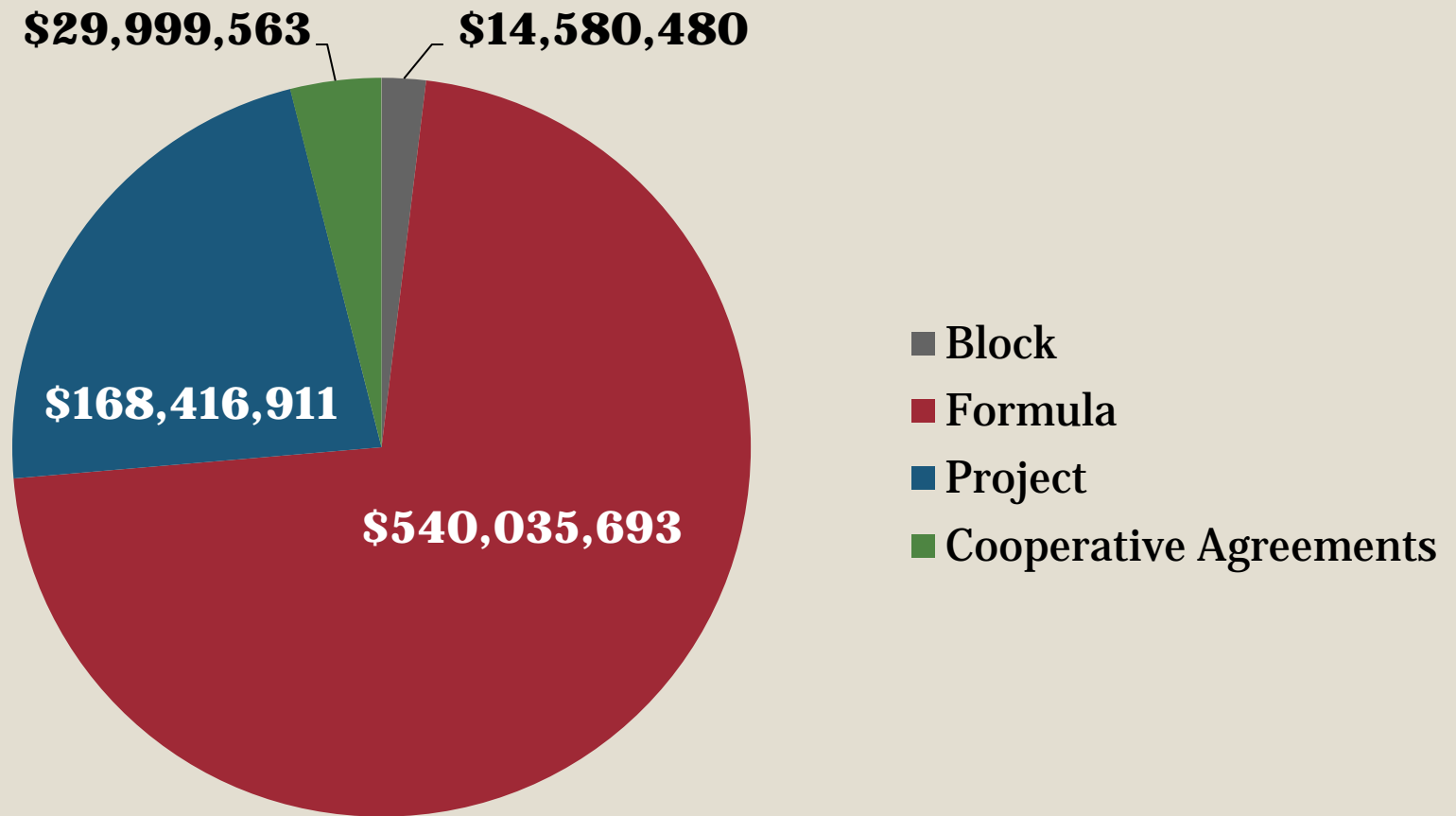 - Participation encouraged

Federal Oversight Now

- 26 Federal Grants Agencies / 29 ARRA Agencies
  - $753 Billion in Grants (FY 2009)
  - About 11,000 OIG staff provide oversight

- Circular A-133 (Single Audit Act) Reports by Independent CPA Firms
  - $500,000 in annual federal expenditures threshold
  - Grantees initiate as part of their Financial Statement audits
  - 35,000 single audits to Audit Clearinghouse
  - OIGs review audit reports and CPA firms

- RATB: $275 Billion in ARRA Funds (88,791 Grants)
- GAO: Forensic Oversight and Special Investigations (FOSI)
- OMB: $110 Billion Improper Payments in FY 2009 (4%)

RATB Data Analytics Coordination
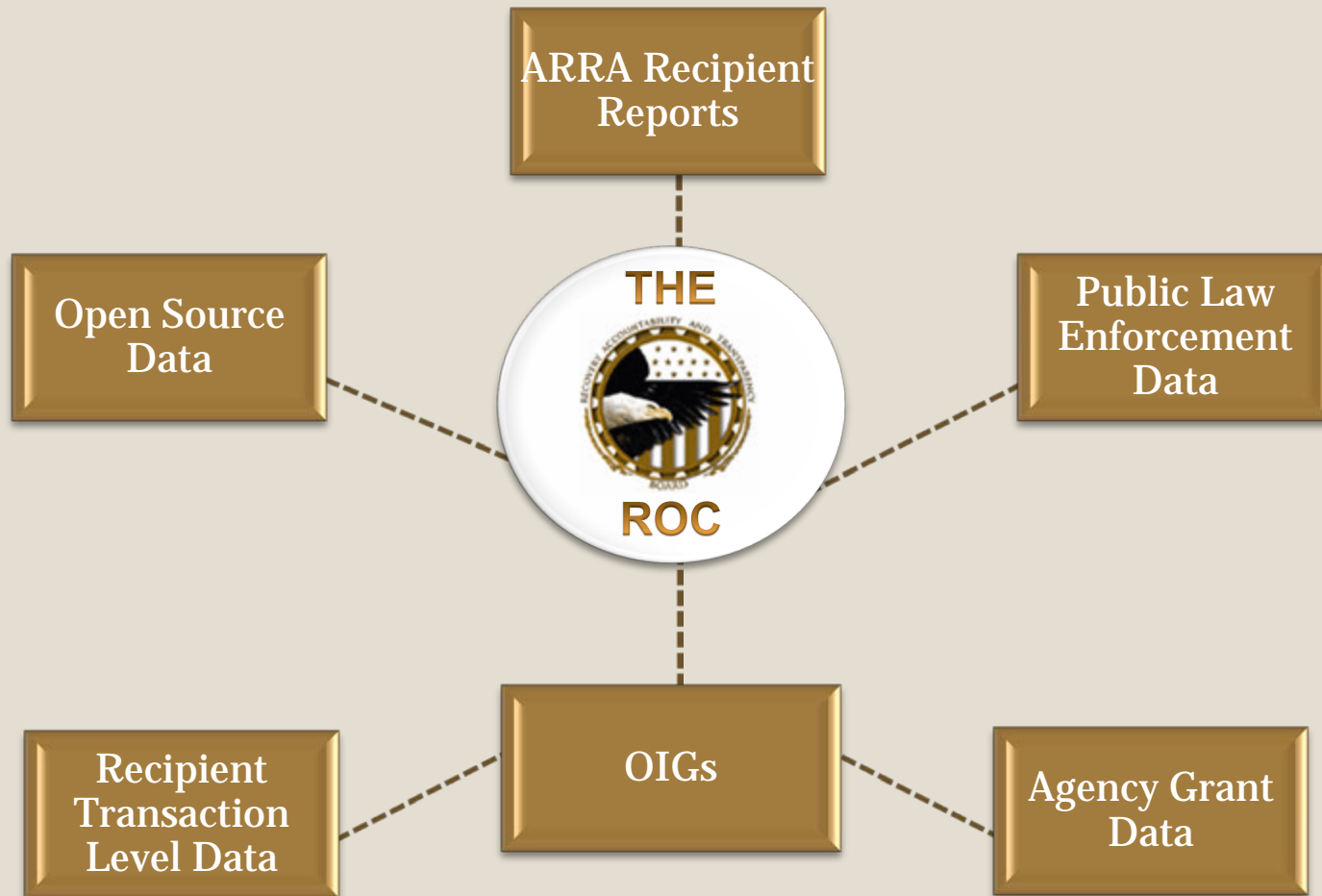
Forensic Techniques

- Focus: Financial Misconduct, Waste, Abuse

- Automated Tools and Techniques

- Analysis of Transaction-Level Data

- 100% Transaction Review

- Integrated Effort with Investigations
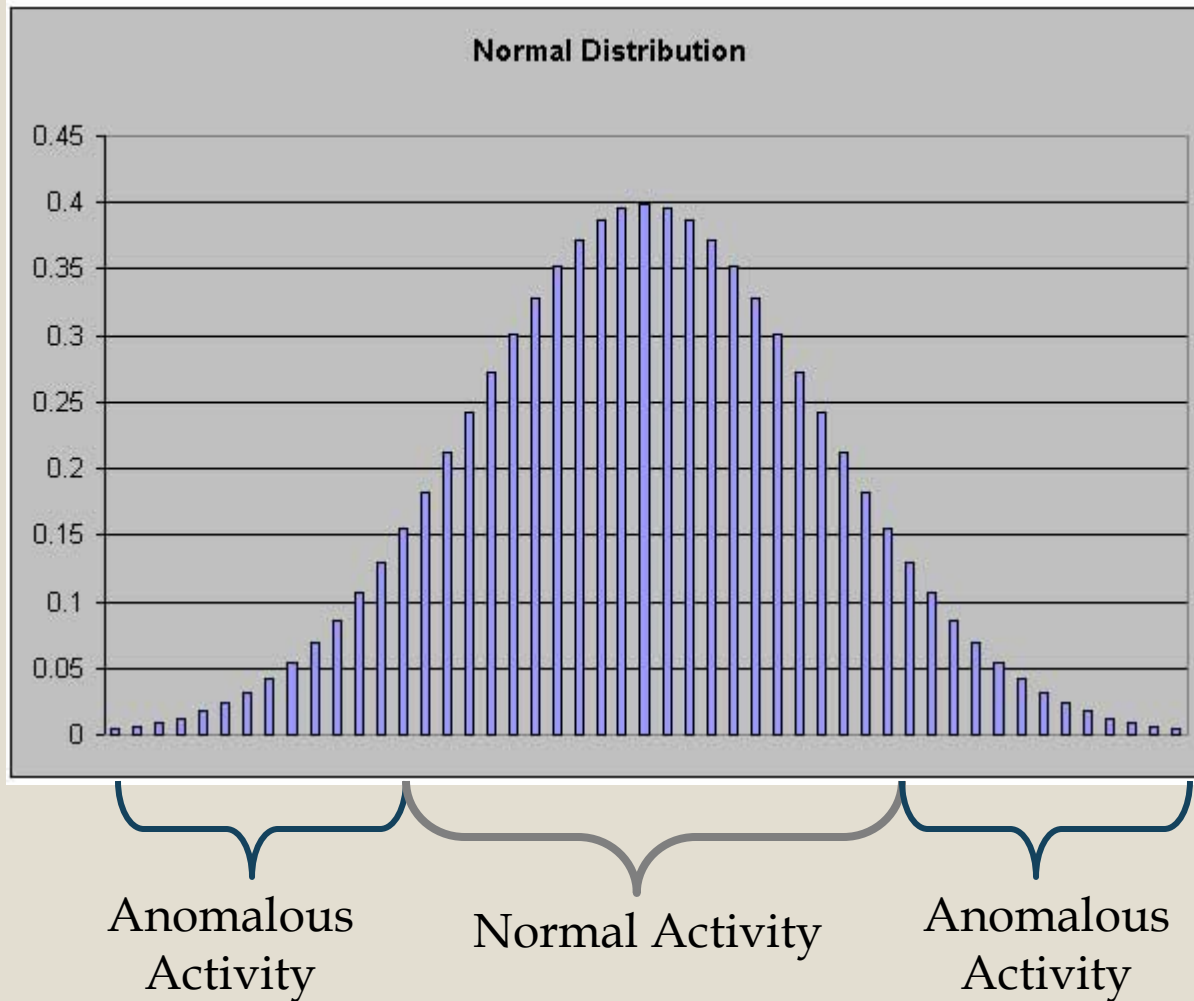
Forensic Techniques: Benefits

- Allows Examination of <u>all</u> Records, not Just a Sample

- Tests not Limited to Predetermined Data Formats and/or Relationships

- Creates Relationships, Checks Calculations, Performs Comparisons
  - Assess limitless number of analytical relationships
  - Summarize large volume of data
  - Database comparison

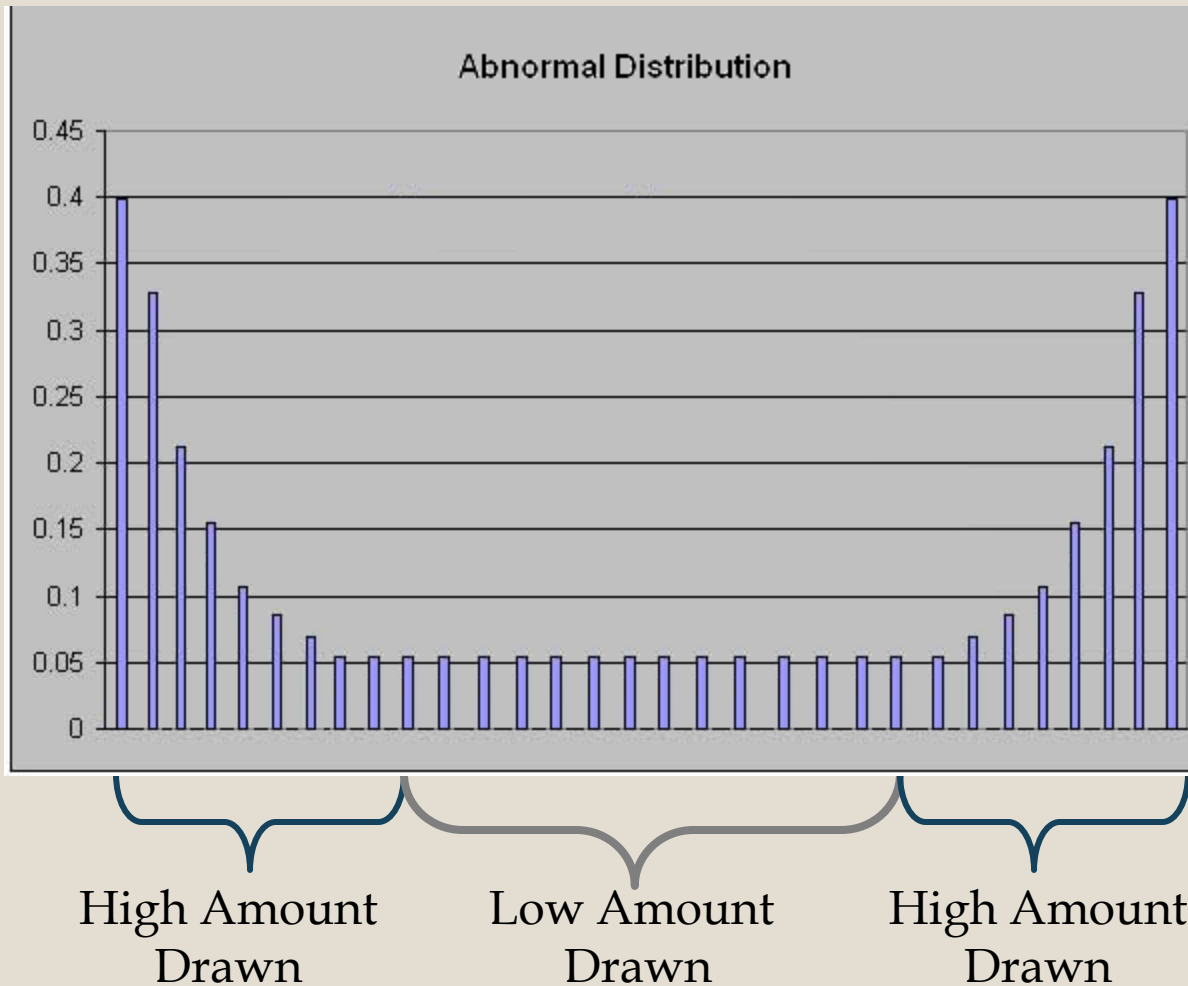- Identifies Anomalies

Normal Distribution

Anomalous Activity   Normal Activity   Anomalous Activity

Awardee not yet Paid

Awardee Paid and in Awardee Table

Awardee Paid but not included in Awardee Table

Awardee Table

Disbursing Transactions
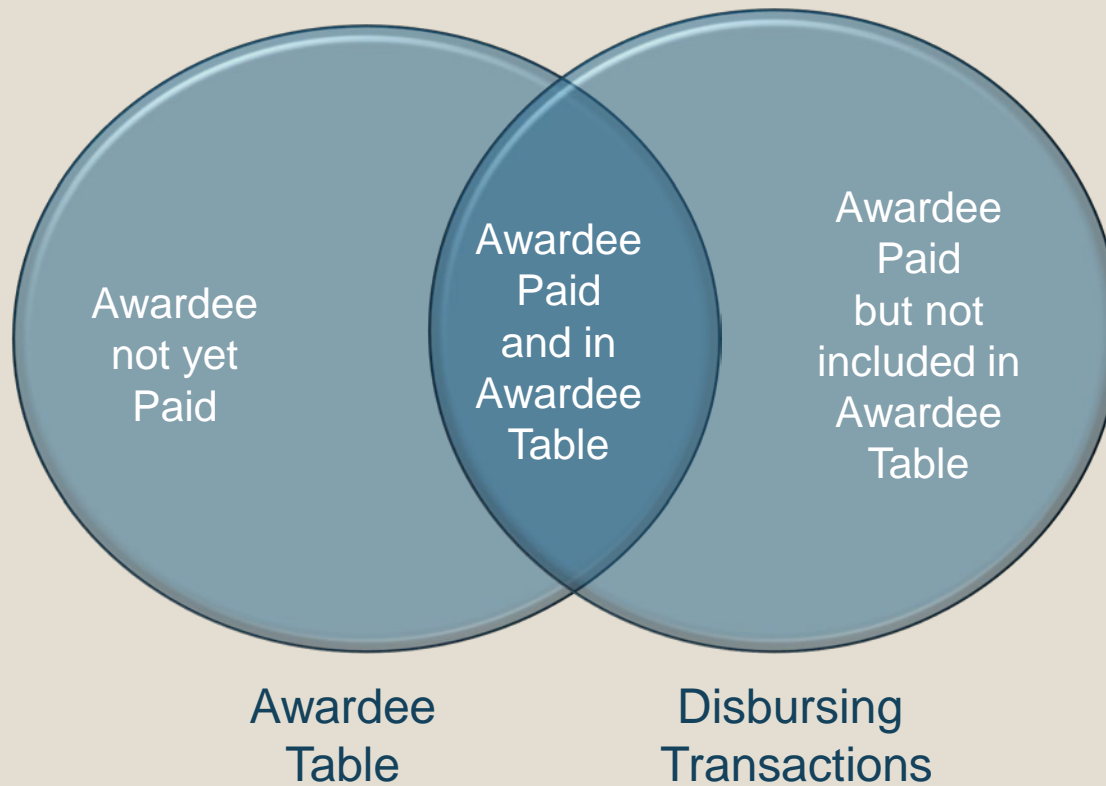
Forensic Techniques:
Hardware and Software Applications

- Hardware
  - SQL servers
  - Mainframe (QMF)
  - Docking stations
  - Terminal server

- Software
  - Data mining and predictive analytics, e.g., Clementine
  - Data interrogation – e.g., ACL, IDEA, MS Access, Excel
  - Statistical analysis – e.g., SPSS and SAS
  - Link analysis – I2, Plantir
  - Lexis-Nexis
  - Data conversion utilities (Monarch)
  - Internet, open-source research
  - Access to system query tools

End to End Process for Grant Oversight

SOLICITATIONS • PROPOSALS • PRE-AWARD REVIEW • AWARD • CASH REQUEST • PAY/ENTITLEMENT • CASH DISBURSEMENTS • POST AWARD • AWARD CLOSE-OUT

PRE-AWARD RISKS

- Funding Over Time
- Conflict of Interest
- False Statements
- False Certifications
- Duplicate Funding
- Inflated Budgets
- Candidate Suspended/Debarred
- New Awardee

ACTIVE AWARD RISKS

- Unallowable, Unallocable, Unreasonable Costs
- Inadequate Documentation
- General Ledger Differs from Draw Amount
- Burn Rate
- No /Late/Inadequate Reports
- Sub-awards, Contracts, Consultants
- Duplicate Payments
- Excess Cash on Hand/Cost Transfers
- Unreported Program Income

AWARD END RISKS

- No /Late Final Reports
- Cost Transfers
- Spend-out
- Financial Adjustments
- Unmet Cost Share
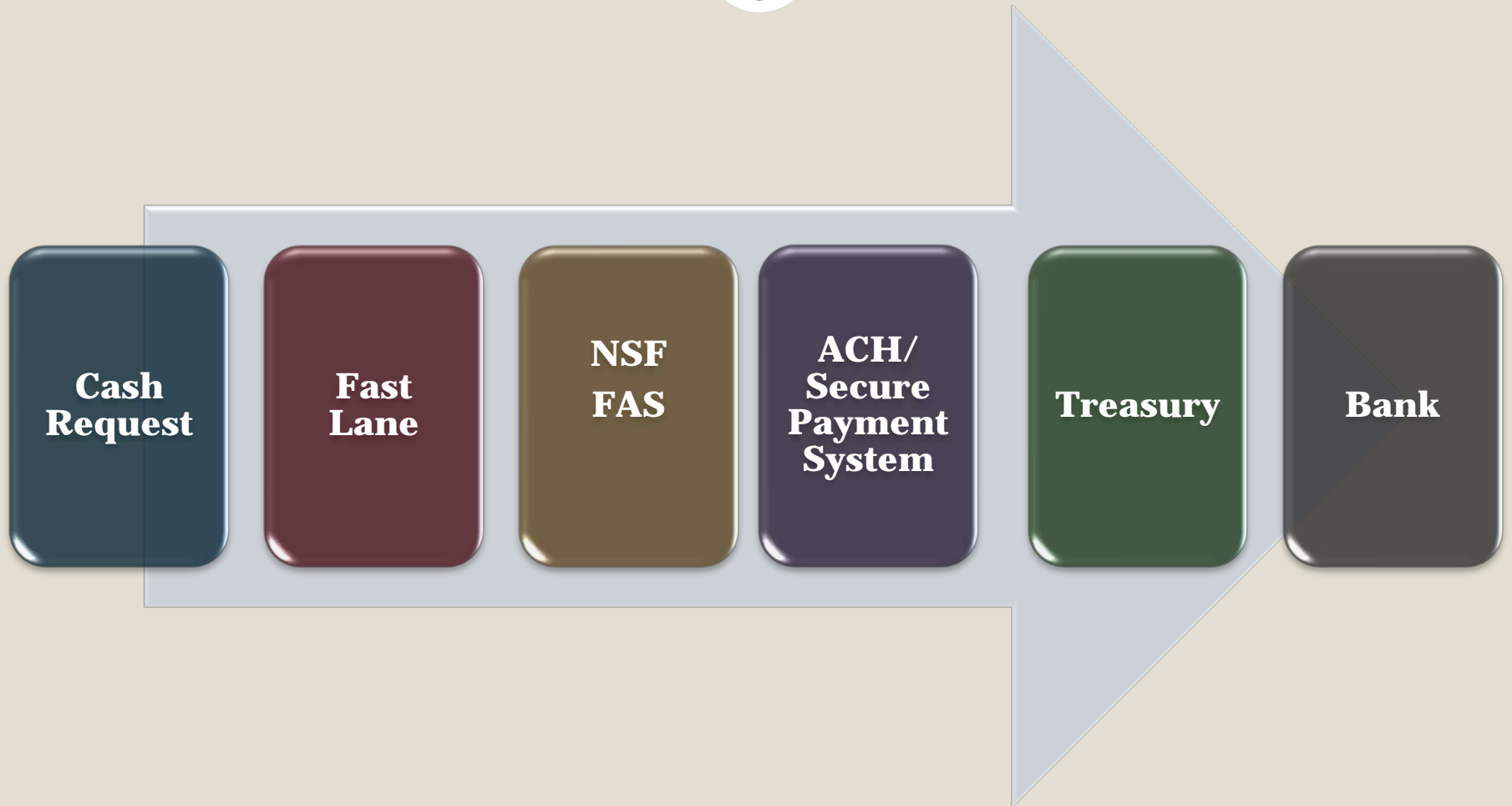
DATA ANALYSIS

Typical NSF Award Process

Cash Disbursement Process

Cash Request → **Fast Lane** → **NSF FAS** → **ACH/ Secure Payment System** → **Treasury** → **Bank**
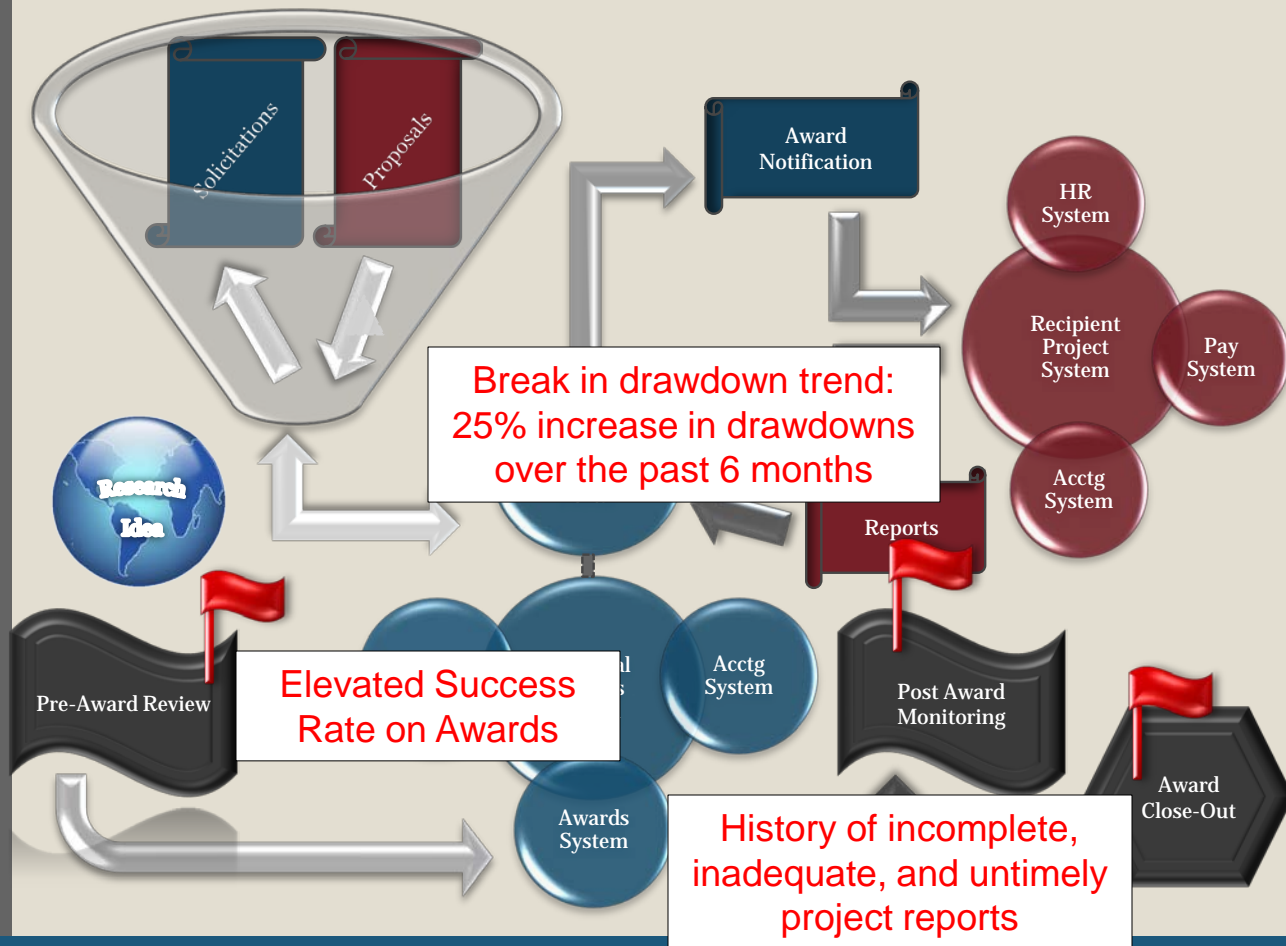
Look at Red Flag Areas

The more red flags, the higher the risk.

R
I
S
K

The less red flags, the lower the risk.

R
I
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Use Data Analysis to Identify Anomalies That are Potential Fraud Indicators, such as Breaks in Trends and Outliers

Solicitations

Proposals

Award Notification

HR System

Recipient Project System

Pay System

Acctg System

Break in drawdown trend: 25% increase in drawdowns over the past 6 months

Research Idea

Reports

Pre-Award Review

Acctg System

Post Award Monitoring

Award Close-Out

Awards System

Elevated Success Rate on Awards

History of incomplete, inadequate, and untimely project reports

- Cost Transfers to Other Projects or Contracts

- Multiple Payments of Same Invoice

- Excessive Costs/Large Budget Reallocations

- Multiple Adjusting Entries
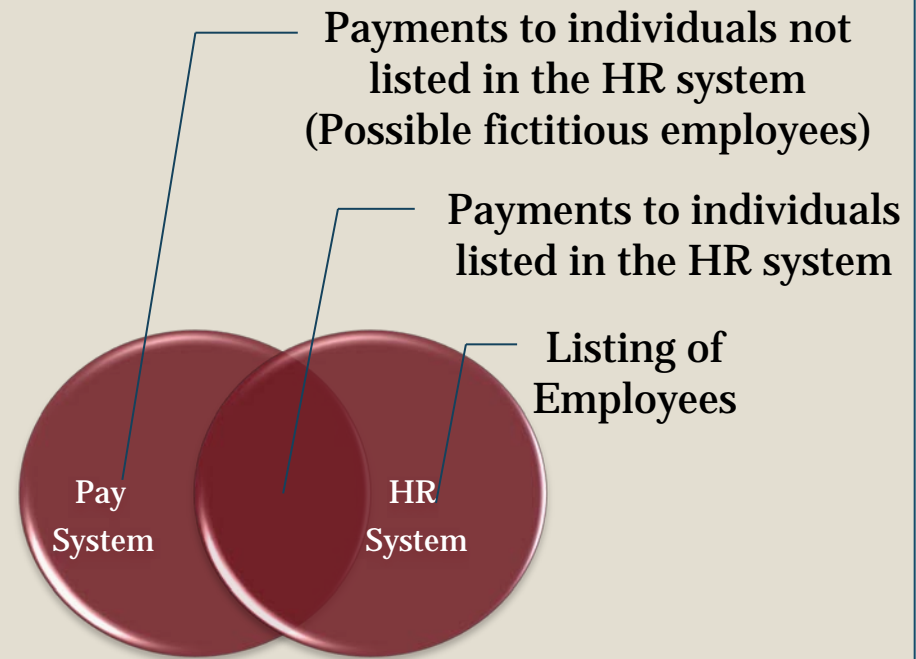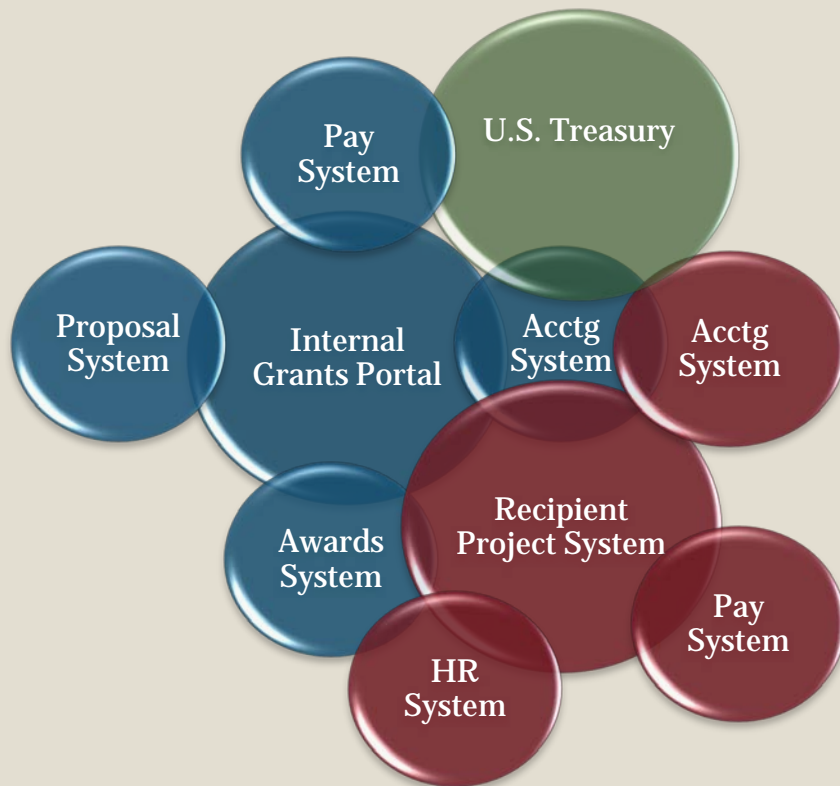
- Unallowable Charges for Interest, Travel, Excess Salary

Anomalies in Payroll Transactions

Compare data from multiple systems

- Pay System
- U.S. Treasury
- Proposal System
- Internal Grants Portal
- Acctg System
- Acctg System
- Awards System
- Recipient Project System
- HR System
- Pay System

Compare records in recipient's system

- Pay System
- HR System

Payments to individuals not listed in the HR system (Possible fictitious employees)

Payments to individuals listed in the HR system

Listing of Employees

- Grantee Draws $2.1 Million in 3 Months
  - Usual drawdown pattern: $250,000 quarterly
  - NSF asks, Grantee cannot provide documentation
  - NSF refers to OIG

- Total NSF Funds Awarded: $23.1 Million
  - Audit Universe 2008: $13.1 Million
  - OIG Questioned Costs: $ 4.2 Million
  - NSF sustains: $ 3.3 Million

- Set Objectives and Define Universe
- Facilitated Brainstorming
    - Risk factors
- Map out End-to-End Process
    - Identify systems and key processes
    - Identify key controls
- Identify and Obtain Transaction-Level Data
    - Record layout
    - ACL, IDEA, Monarch
- Build Targeted Business Rules and Run Against Data
    - PI/Institution patterns over time
    - Risk factors
- Examine Anomalies

Suggested Resources

Council on the Inspectors General on Integrity and Efficiency (CIGIE)

http://www.ignet.gov/

Federal Audit Executive Council

http://www.ignet.gov/pande/faec1.html

Additional Information

- National Procurement and Grant Fraud Conference
  Philadelphia, November 15-17, 2010

Questions?

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