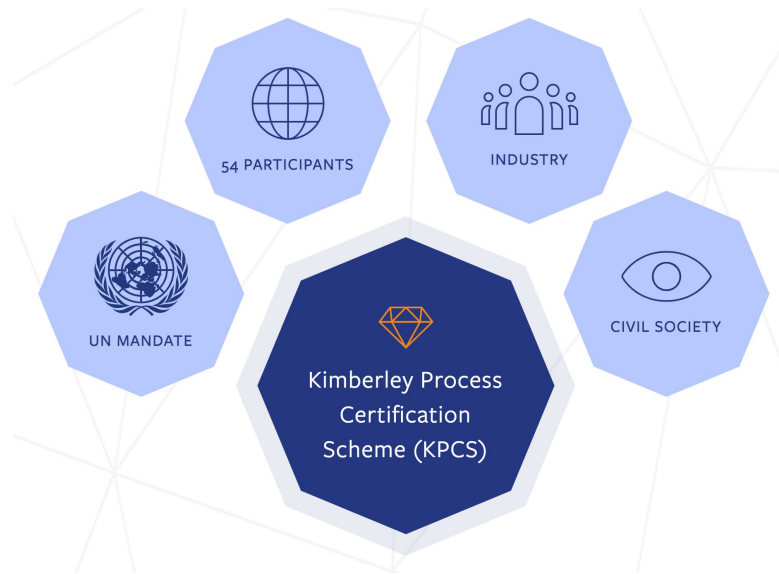


# KIMBERLEY PROCESS INTERNAL DATA CAPTURE UPGRADE

Economic Directorate  
Governments & Trade Management Division  
Carolyn T. Francis — KPCB Branch Chief

# WHAT IS THE KIMBERLEY PROCESS CERTIFICATION SCHEME?

- ➔ International certification process designed to prevent the trade of conflict diamonds.



Census Bureau = United States KPCS exporting authority

# SAMPLE CERTIFICATES

US 10091 K07031110030178

## KIMBERLEY PROCESS CERTIFICATE

UNITED STATES OF AMERICA

*The rough diamonds in this shipment have been handled in accordance with the provisions of the Kimberley Process International Certification Scheme for Rough Diamonds.*

Issuing Authority: U. S. E. P. A. Date of Issue: 11/11/05

Exporter: \_\_\_\_\_ Date of Expiry: 11/11/06

Importer: Mohamed Elmaghrabi Number of Parcels: 2

Value in U.S. \$: 450,000 Carat Weight/Measure: 30.81

Relevant Harmonized Commodity Description and Coding System: 710231 0000

The issuer of this certificate accepts no responsibility relating to the accuracy of the data recorded by the exporter in the referenced shipment.



L76151

Republic of Liberia  
MINISTRY OF LAND, MINES AND ENERGY  
CERTIFICATE NUMBER: #LR010059

## Kimberley Process Certificate

The rough diamonds in this shipment have been handled in accordance with the provisions of the Kimberley Process Certification Scheme for rough diamonds.

Country of Origin (mining): Republic of Liberia Number of Parcels: 2 parcels (in 2 boxes)

Name and Address of Exporter: \_\_\_\_\_

Name and Address of Importer: CTD Diamond N.Y. Anthony Diamond, K.S.N.G., P.O. Box 100, Monrovia, Liberia

HS Classification	Carat	Value (USD)
7102.10	---	---
7102.21	172.36	6,931.00
7102.31	1,315.20	987,069.00


This certificate is issued in accordance with Chapter 40, New Minerals and Mining Law, Part 1, 10/23/13.

Issuing Authority: G.D. Minister of Land, Mines and Energy

Name of Issuing Officer: \_\_\_\_\_

Signature of Issuing Officer: \_\_\_\_\_

Issued on: July 11, 2006 Expires on: Sep 23, 2006



L76151

Republic of Liberia  
KIMBERLEY PROCESS CERTIFICATE  
IMPORT CONFIRMATION  
CERTIFICATE NUMBER: #LR010059

It is hereby certified that the rough diamonds in the shipment exported from: \_\_\_\_\_

Were accepted for import into: \_\_\_\_\_

by: \_\_\_\_\_

and that the import has been checked and verified in compliance with the provisions of the Kimberley Process Certification Scheme for rough diamonds

HS Classification	Carat	Value (USD)
7102.10		
7102.21		
7102.31		

Signature of Authorizing Officer: \_\_\_\_\_

Stamp of Importing Authority: \_\_\_\_\_

Kimberley Process certificates from (a) United States and (b) Liberia.

# ISSUE: INTERNAL DATA CAPTURE SYSTEM

- Internal database containing rough diamond shipment trade data
- Built in 2005, outdated
- Undermines effectiveness of system

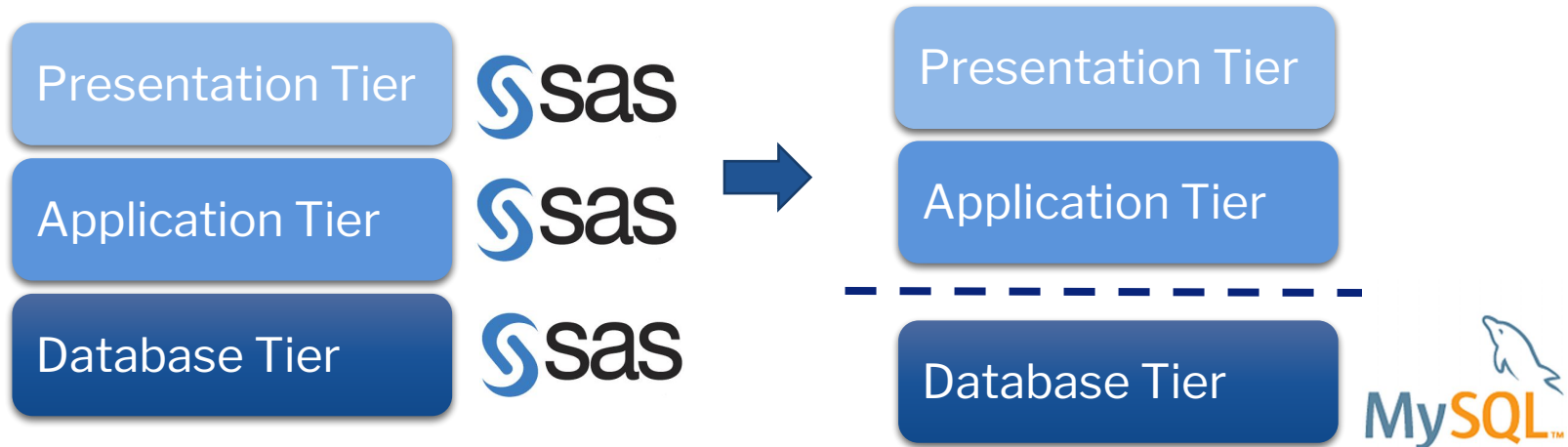
## **Largest Problems**

1. Concurrency
2. Authorization
3. Persistent bugs

*‘Every time we fix one thing, something else breaks.’*

# PROJECT OBJECTIVES

- Research and develop a proof-of-concept for migrating data into a relational database management system (RDBMS).
- Data independence to support full application rebuild.



# DELIVERABLES

- ✓ Data/application documentation
- ✓ Optimized database schema
- ✓ Script for automated transfer of SAS datasets into database
- ✓ Functional MySQL RDBMS
- ✓ Full stack proof-of-concept

# CERTIFICATE SEARCH INTERFACE

Search Export KPC's

KPC Number: 45 Value: Cerat: Exporter: Country of Origin: Country of Destination: Issued Date:

	KPC Number	KPCRecode	Exporter	Country of Origin	Country of Destination	Value_710210	Value_710221
1	US0008445					00000000.00	00000000.00
2	US0008450					00000000.00	00000000.00
3	US0008451					00000000.00	00000000.00
4	US0008452					00000000.00	00000000.00
5	US0008453					00000000.00	00000000.00
6	US0008454					00000000.00	00000000.00
7	US0008455					00000000.00	00000000.00
8	US0008456					00000000.00	00000000.00
9	US0008845					00000000.00	00000400.00
10	US0009445					00000000.00	00000000.00
11	US0010145					00000000.00	00000600.00
12	US0010245					00000000.00	000017920.80
13	US0010345					000045843	00000000.00
14	US0010445					00000000.00	000027182.30
15	US0010450					00000000.00	000005274.50
16	US0010451					00000000.00	000033000.00
17	US0010452					00000000.00	000033000.00
18	US0010453					00000000.00	000049873.50
19	US0010454					00000000.00	000012572.70
20	US0010455					00000000.00	000007300.00
21	US0010456					00000000.00	000006639.00
22	US0010457					00000000.00	000051340.11
23	US0010458					00000000.00	000026908.08
24	US0010459					00000000.00	000018123.26
25	US0011045					00000000.00	000025733.15
26	US0011145					00000000.00	000014650.00
27	US0011245					00000000.00	000028657.80

Existing interface for export certificate search, built c. 2005

# CERTIFICATE SEARCH INTERFACE 2.0

KP Internal Capture Database [Import search](#) [Export search](#)

## Search KP Export Certificates

[Download](#)

KPC number	Exporter	Country of origin	Country of destination	Issue date	Value	Carat	
<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<input type="text"/>	<a href="#">Search</a>
EX0000288	[REDACTED]	[REDACTED]	[REDACTED]	20180302	1031359.00000	000000430.00	<a href="#">View</a>
US0000448	[REDACTED]	[REDACTED]	[REDACTED]	20100430	631954.88000	000011002.00	<a href="#">View</a>
US0002257	[REDACTED]	[REDACTED]	[REDACTED]	20150826	0.00000	000000000.00	<a href="#">View</a>
US0003001	[REDACTED]	[REDACTED]	[REDACTED]	20180110	0.00000	000000000.00	<a href="#">View</a>
US0006109	[REDACTED]	[REDACTED]	[REDACTED]	20030616	0.00000	000000000.00	<a href="#">View</a>

Updated interface in full proof-of-concept integrates with new database.



# THANK YOU!

**#CDF2019**

Rachel Dodell

Chris Kuang

Hillary McLauchlin

Lauren Maffeo

My fellow fellows

**Census.**

Carolyn T. Francis

Earle Patrick

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Rachell Hall



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