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Florida - Senate Bill 7054 (S7054)

Rep. Wyman Duggan  
Sen Jim Boyd  
Senator Nick DiCeglie

Indiana - Senate Bill 468 (SB468)

Sen. Chris Garten  
Senator Eric Koch  
Senator Greg Taylor

Alabama - Senate bill SB330

Sen. Dan Roberts

North Dakota - Senate Bill 2392

Senator Bob Paulson  
Senator Judy Estenson  
Senator Mike Wobbema

South Dakota - House Bill 1193

Rep Mike Stevens  
Rep Hugh M. Bartels  
Rep David Kull  
Rep Carl E. Perry

Louisiana - HB 415

Beryl A. Amedée  
Paula P. Davis  
Stephanie Hilferty

North Carolina (H721)

Rep. Mark Brody  
Rep. Harry Warren

# GOLD DIGR White Paper – 2024, Ver 5

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<https://broward.ghost.io/tag/gold-currency/>



I'm a software developer with 35 years of experience. I believe there may soon be demand from State governments for R&D, prototyping and development of gold-backed digital currencies as described in [Texas bills S.B. No. 2334 and H.B. No. 4903](#).

## Abstract:

This paper contains three complementary proposals to create a digital currency backed by a State-regulated depository like the [Texas Bullion Depository](#) established in 2015. The first proposal is the currency itself including history, justification and legislation, the second is a development strategy, the third adds flexible exchange rates between participating States.

- 1) [GOLD DIGR](#) is an overview of a State-regulated digital currency necessitated by historical and political forces, current legislation and strategic design.
- 2) [TWG proposes a multi-State committee](#) to develop a standard currency framework adaptable to multiple States and external partners.
- 3) [SXS is an interstate currency exchange system](#) similar to the BRICS attempt to compete with the Federal Reserve's centralized system.

My goal with these mailings is to make this into a real system via State funding, grants, corporate sponsorship, etc. I've had an ongoing interest in this since 1994, I believe in it and have the skill and knowledge to make happen. [My background is eclectic](#) and spans startups, corporations, State and Federal systems for 35 years.

## Historical Background

This current period of fiat currency has already lasted longer than previous fiats of the past several hundred years and contrary forces are aligning to end it. Russia and China have planned for the end of the fiat dollar for the past fifteen years, the US dollar is ripe for replacement as the world reserve currency, and the current Federal debt is unsustainable.

## Gold Standard

The longest period in modern history without a gold standard is now; from 1971 to 2024 or 53 years. The last major gold standard system was the Bretton Woods system, which operated from 1944 to 1971. The United States has abandoned its gold standard in unusual situations (Civil war, World War 1, etc) but only briefly.

## Russian Gold Reserves

Since 2009, Russia's central bank has steadily increased gold reserves to diversify away from the US dollar and foreign currencies. According to the World Gold Council, Russia's gold reserves more than tripled from 600 metric tons in 2009 to over 2,300 metric tons in early 2021.

## Chinese Gold Reserves

China has consistently increased gold reserves since 2009 to diversify away from US dollars and foreign currencies, according to data from the People's Bank of China (PBOC). China's gold reserves grew from 1,054 metric tons in 2009 to over 1,948 metric tons in early 2021.

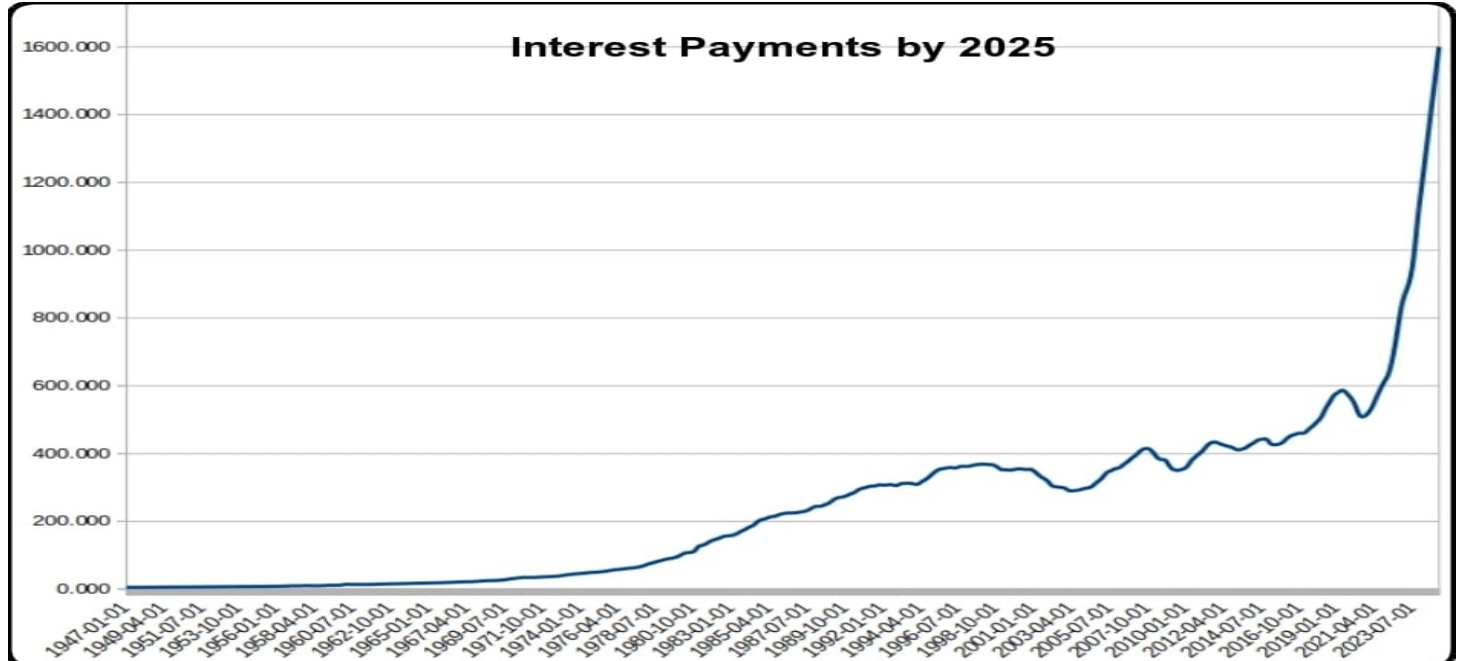
## Hegemony

Western hegemonic empires since 1400 A.D. had an average lifespan of 95 years and the United States has already exceeded that. The world reserve currency is usually a function of the current hegemony.

COUNTRY	DATES	DURATION	CURRENCY	
Portugal	1450 to 1530	80 years	Real	
Spain	1530 to 1640	110 years	Escudo	Gold influx from the New World
Netherlands	1640 to 1720	80 years	Guilder	
France	1720 to 1815	95 years	Franc	
Great Britain	1815 to 1920	105 years	Pound	
United States	1920 to 2023	103 years	Dollar	WW1 loans boosted US\$

## Interest Payments

The current rate of increase in [Federal debt interest payments](#) is unsustainable.



## Interest Rates

As debt increases, rates must fall to maintain equilibrium. Interest rates during the credit upcycle (1980 to 2020) have fallen as far as investors will tolerate. This return of higher rates will be disastrous for the current debt.



## BRICS Strategy

De-dollarization. The BRICS separate financial system aims to use their oligopoly power to control commodity prices and bypass the US Dollar. BRICS countries control 50% of the world's food supply, 70% of the microchip supply (China + Taiwan) and enough energy to control pricing in concert with a partner like Saudi Arabia or Venezuela.

	Oil	Natural Gas	Wheat	Rice	Fertilizer	Microchips	Titanium	Iron Ore	Aluminum	Nickel	Magnesium	Copper
Brazil	4			2				17		4	6	
Russia	11	23	8		15			4	6	9		4
India			13	28			2	10			4	
China	5	7	17	35	13	20	40	14	57	4	63	8
South Africa							10					
Ukraine			3				2					
Iran	4	9	2		1						1	
Taiwan						50						
Worldwide Percentage	24	39	43	65	29	70	54	45	63	17	74	12

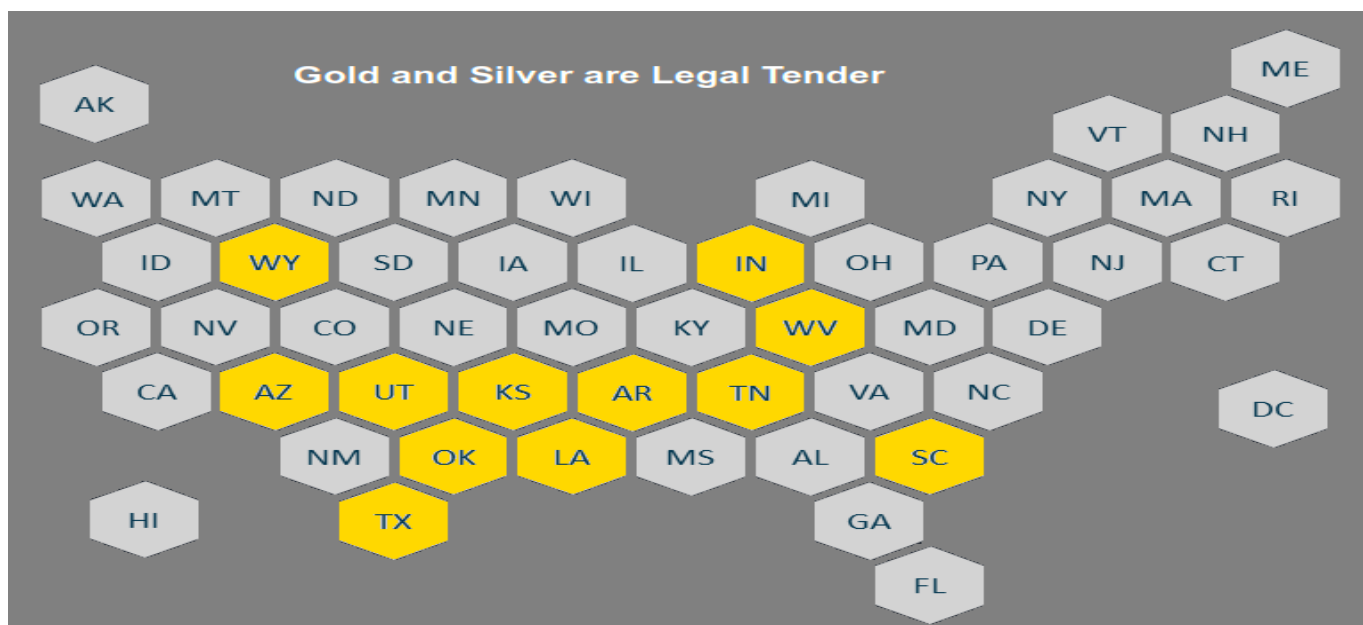
## USA Legislation

The **Sound Money Movement** is a [political and economic movement](#) that advocates for a stable, reliable currency and believes central banks should not manipulate currencies for political gain and that a gold or silver-based currency would provide greater stability. The movement supports precious metal legislation across the United States.

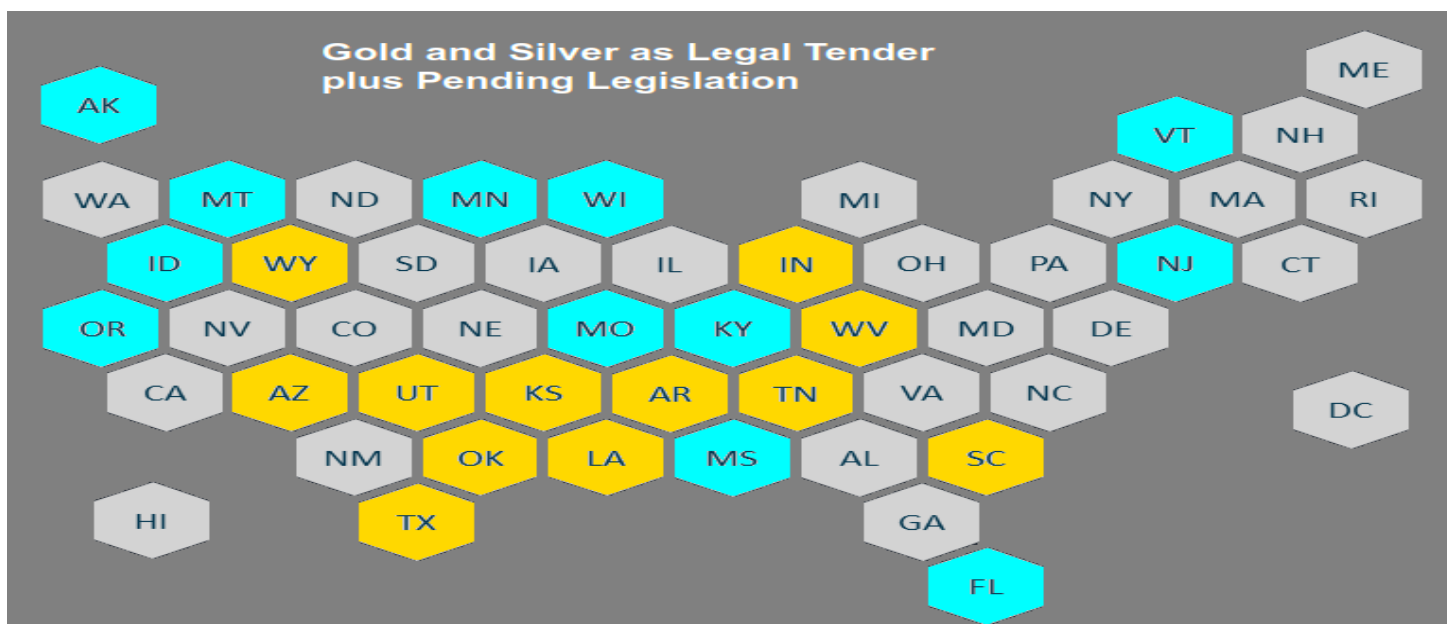
### Three-Step Legislative Strategy

1. Pass legislation to legalize gold and silver
2. Create a State-controlled precious metals repository
3. Create a digital token currency backed by the repository

1) States where gold and silver are legal tender



2) Previous States plus States with pending legislation



## Previous Depository Legislation

[Texas Bullion Depository Bill](#) - signed into law in 2015 to create a state bullion depository.

[2023: Tennessee Bullion Depository Act](#) - SB 150 to establish a precious metals depository.

[2023: Mississippi SB2966](#) - establish the Mississippi bullion depository

[2023: Missouri HB718](#) - create the "Missouri Bullion Depository."

[2023: North Carolina H721](#) - State Precious Metals Depository Study

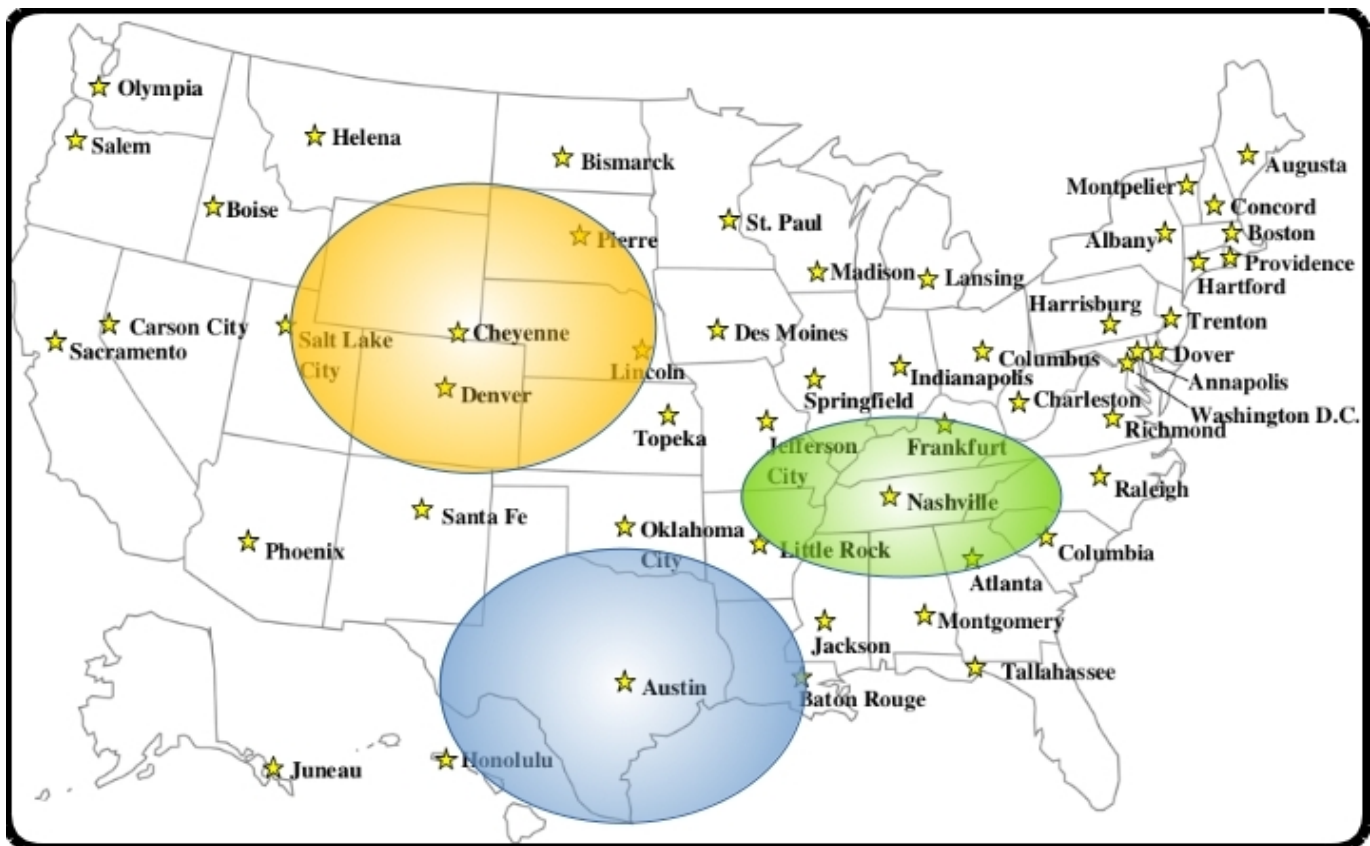
[2023: Idaho H0180](#) - invest in precious metals held in a secure depository

[2023: Oklahoma SB 816](#) - Establish a State Treasury Depository

[2023: Montana HB0884](#) - Department of Revenue authorizes a media of exchange using gold

## Impedance-Matched Currency

Creating the Euro was somewhat like harnessing a horse, a mule, a dog and a turtle to pull a wagon. A "one size fits all" strategy creates stresses because regions (States) have different resources, skill levels, goals. Most economic transactions are local and a State currency would be controlled regionally.



# GOLD DIGR Proposal

This is an abstract high-level diagram of how a gold-backed digital currency would work.

A more detailed design is at <https://broward.ghost.io/golddigr/tactical>

**Depository:** stores gold deposits.

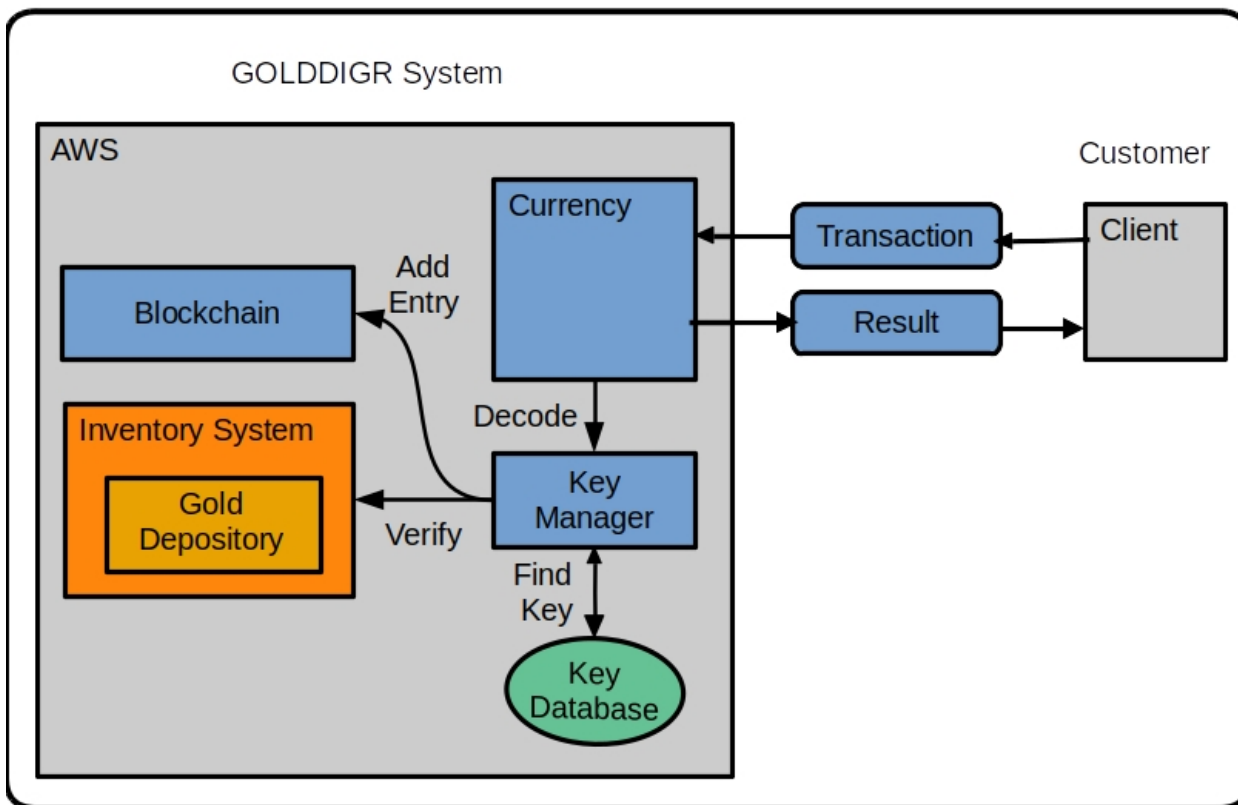
**Inventory System:** manages gold deposits

**Currency:** manages cash transactions

**Blockchain:** equivalent to accounting ledger

**Key Manager:** equivalent to safety deposit box keys

**Client:** Customer with gold in depository



Assumptions: An existing depository has an existing inventory management system. That system needs to synchronize with the blockchain entries.

## Low Energy Use:

GOLD DIGR won't require enormous energy. It should consume the same energy as sending an email or editing a document. Most crypto-currencies refer to "mining" which uses energy-intensive functions to create artificial scarcity. GOLD DIGR's scarcity is the gold depository itself

## Low Complexity:

GOLD DIGR is less complex than crypto-currencies. It doesn't require "proof" schemes to generate scarcity, validation and consensus mechanisms, etc.

## Sending A Transaction

1. Client sends a transaction to Currency API

Example message:

```
{  
  "message": {  
    "message_type": "texas_transaction",  
    "version": 1.12,  
    "date": "2024-02-03T06:48:07",  
    "ID": 010102283,  
    "payer": 12221,  
    "payee": 1023,  
    "amount": "$100"  
  }  
}
```

2. Currency forwards message to Key Manager.

3. Key Manager verifies the payer, payee and payer's balance.

4. Key Manager creates blockchain entry and sends result to Currency.

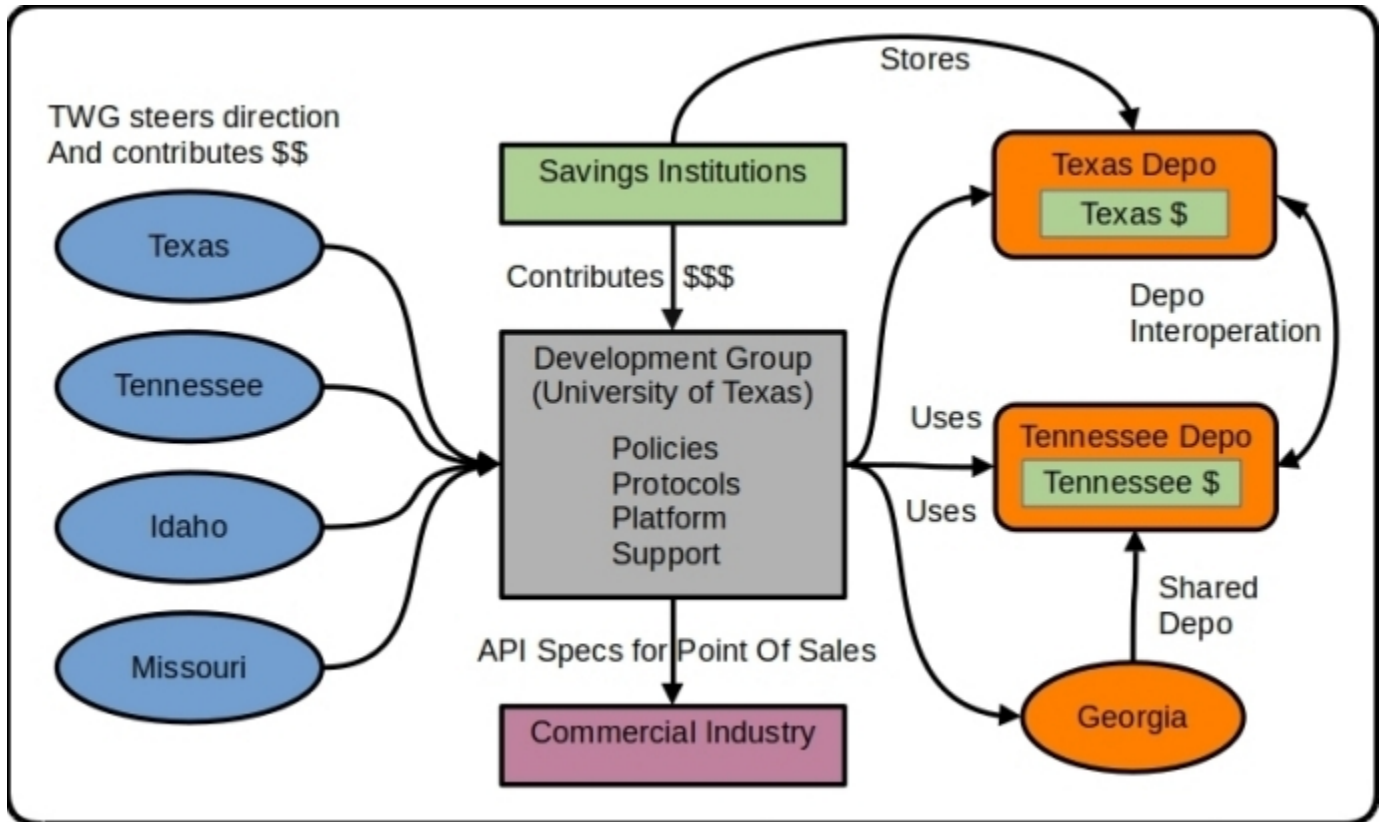
5. Currency sends result to client.

A much more detailed design is at <https://broward.ghost.io/golddigr/tactical>  
More information on [AWS implementation](#)



# TWG Proposal (Technical Working Group)

[Recent legislation](#) shows significant interest in Texas-style precious metal depositories. This proposal is for a Technical Working Group (TWG) of interested parties to fund joint development of regional depositories with common procedures and a digital currency platform. Here's an example.



We used this model at Federal Highway from 1994 to 1996 to develop [ASPEN, CDLIS and ISS software](#) with a permanent staff of five. Ten States contributed 1-2 members each quarter for a three-day design and feedback meeting (about 500 man hours annually).

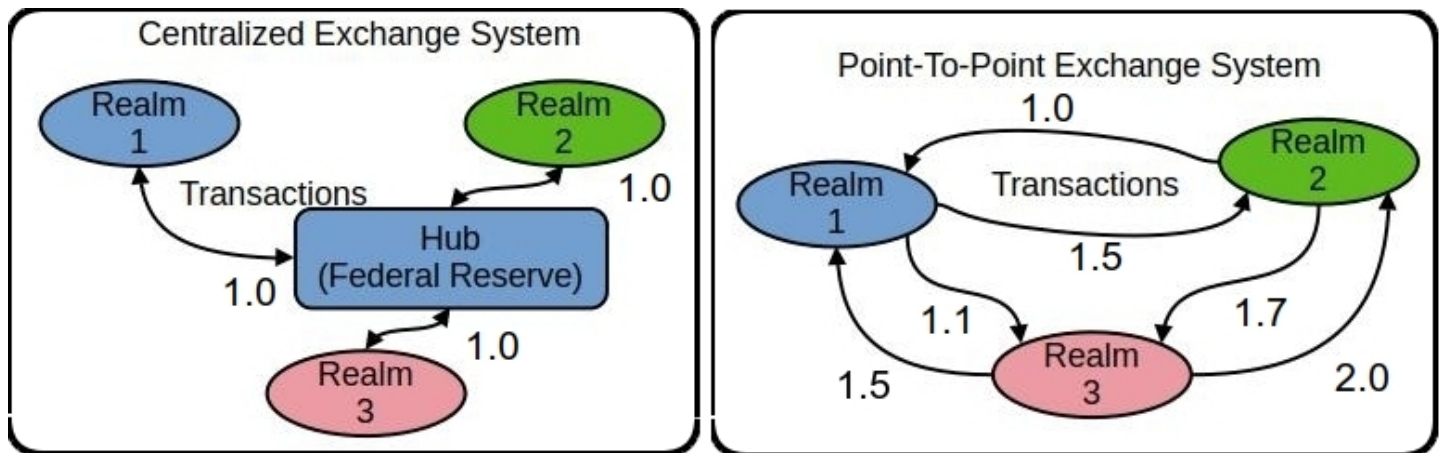
## 5 Major Components

- 1) Development Group** - Independent organization which combines input to produce policies, protocols and platform for State depositories.
- 2) Technical Working Group (TWG)** - a steering committee of States which contribute funding, feedback and policies from part-time advisors in each State.
- 3) Regional Depositories** - State depositories which support digital currencies and interoperate with other depositories.
- 4) Savings Institutions** - contribute funding to use the State depositories and currencies as a mechanism of investment and wealth preservation.
- 5) Commercial Industry** - retail vendors, 3rd party developers to support digital currencies.

# SXS Proposal (State Exchange System)

The SXS platform has three functions.

- Manage financial transactions between platform members
- Collect information to calculate real-time exchange rates
- Adjust foreign reserves pools between platform members

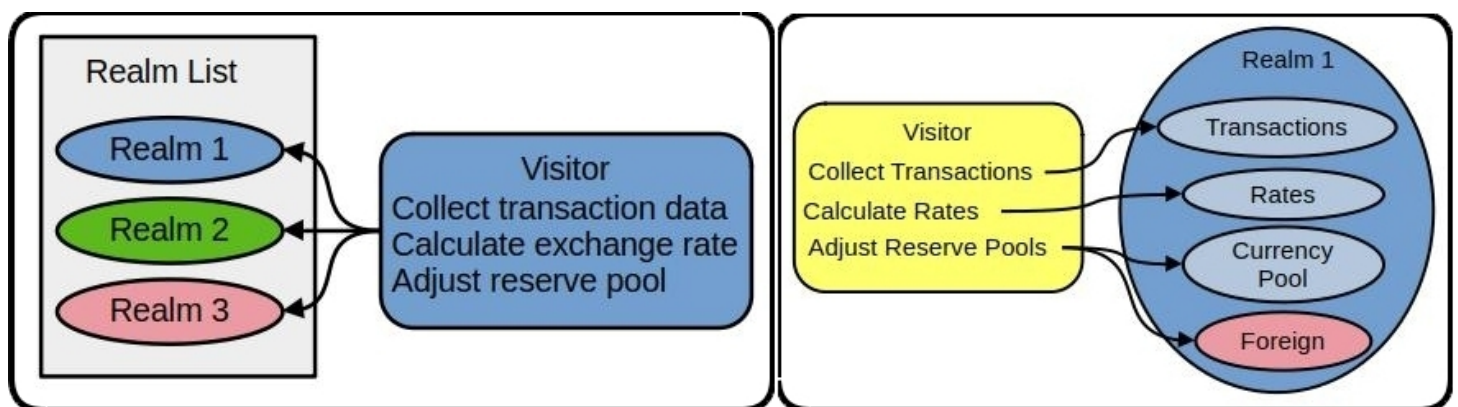


## CENTRALIZED

This is the design of the Federal Reserve and the realms represent countries and States. It's inflexible but efficient and scalable with a single point of control and authority (hub). Over 100 countries use it.

## POINT-TO-POINT (PTP)

The BRICS countries are creating a point-to-point system which is less efficient but has more flexibility and freedom. Different rates are possible between Realm1 to Realm2 and Realm1 to Realm3, etc.



In the PTP system, a visitor regularly converses with all realms and executes a common set of functions. Within each realm are pending transactions, current exchange rates, foreign reserve pools. The visitor executes transactions, recalculates exchange rates and balances foreign reserve pools. Exchange rates are determined by the relationship between two realms instead of a central authority and each country (State) has some control in the exchange rate for each trading partner.

Here is a [small working software model of SXS \(https://github.com/broward/BRICS\)](https://github.com/broward/BRICS)  
[More detailed model \(https://broward.ghost.io/BRICS\)](https://broward.ghost.io/BRICS)

## Author

Thirty-five years of eclectic software development, including seven startups, IT staff at a major university, several USDOT grants and fifteen years of corporate consulting. Three DEFCON presentations on predictive analytics.

## State governments

From 1991-1996, I was the original architect in several Federal Highway Administration grants developing the [first handheld and wireless systems \(ASPEN, CDLIS, ISS\) for State-level motor carrier inspections](#). I led a quarterly design conference with representatives from ten States to define features and recommendations and worked directly with State managers, IT staff and police officers, often on-site. We achieved a 40-State adoption of this software.

## Digital Currencies

Hands-on work with three currencies - the Digital Money Trust in 1994 (a precursor to Bitcoin), an IoT token prototype in 2014 and [Sila stablecoin in 2018](#) which received \$21 million in venture capital. I developed the MVP (minimum viable product) in 100 days and we used it in 50 demonstrations for funding. I designed and wrote about 75% of the original beta release code, API, security.

## Contracting

Significant projects at Boeing (call center), Avnet (e-commerce), Aetna (case management), Amdocs (payment system), DLVR.com (video analytics), Verizon (ring tone sales), Staples (e-commerce). Many run one million+ transactions per day and had requirements for internal integrations, adapters and legacy limitations, etc.

## DEFCON

Three DEFCON convention presentations in 2005-2007 on predictive analytics and memetic manipulations such as election hacking.

## Related Material By Me

Texas Depository, 2023 ([https://broward.ghost.io/texas\\_depo](https://broward.ghost.io/texas_depo))  
BRICS Currency System, 2023 (<https://broward.ghost.io/BRICS>)  
AWS App Design, 2023 ([https://broward.ghost.io/aws\\_app\\_1](https://broward.ghost.io/aws_app_1))  
Stablecoin Hack, 2022 ([https://broward.ghost.io/stablecoin\\_hack](https://broward.ghost.io/stablecoin_hack))  
Miner Bankruptcy, 2022 ([https://broward.ghost.io/miner\\_bankruptcy](https://broward.ghost.io/miner_bankruptcy))  
Polymorphic API, 2022 ([https://broward.ghost.io/polymorphic\\_api/](https://broward.ghost.io/polymorphic_api/))  
Crypto Platform, 2020 ([https://broward.ghost.io/crypto\\_platform](https://broward.ghost.io/crypto_platform))  
Payment System, 2015 ([https://broward.ghost.io/payment\\_system](https://broward.ghost.io/payment_system))  
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Jing Currency on IoT, 2014 ([https://broward.ghost.io/digital\\_on\\_IoT](https://broward.ghost.io/digital_on_IoT))  
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Multi-Tenant Systems, 1996-2018 (<https://broward.ghost.io/multi-tenant>)  
Federal Highway System, 1992-1996 (<https://broward.ghost.io/FHWA/>)  
Hacking the Planet, 1988 ([https://broward.ghost.io/hack\\_the\\_planet](https://broward.ghost.io/hack_the_planet))