

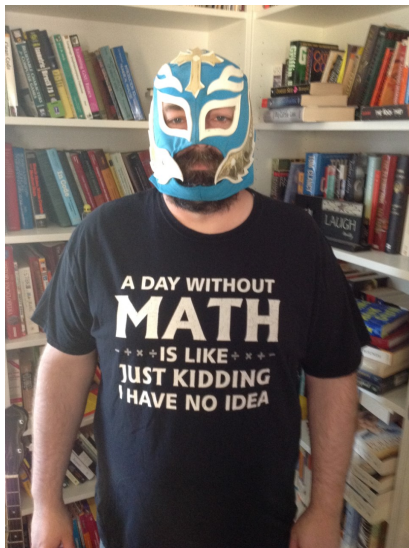
Oak Island Mystery

Mars Stirhaven
March 15, 2019



- I would like to thank the organizers for giving me this opportunity to present this material.
- I promised one of the organizers that I would start the talk wearing the Mexican wrestling mask.
- Nearly everyone here knows me and would easily recognize me before the “dramatic” reveal so...

This will have to suffice...



Publishing a Book

- Since you know me and you know how much I hate writing up anything (except code), you're surely as surprised as I am that I wrote a book.
- My Amazon Author Bio says I hate writing (which might be a first for an author) and everything I wrote was absolutely true!
- I used a pen name for anonymity concerns and because not divulging my affiliations made the prepub process easier and faster.
- I used the Mexican wrestling mask (won in a mathematics contest) and a Gold Bug pendant (also an award) for my Bio pics (for which Facebook has banned my Stirhaven account!).

Publicizing a Result

- It turns out publicizing a result is hard work—especially for someone who doesn't want to do it.
- Most of the book reviews have been amazing, especially from the reddit crowd, but I just got my first scathing review.
- I wanted to reply and correct all the errors in the review but goodreads, and my wife, continue to strongly suggest that authors should not respond to negative reviews.
- Since I'm not an author by profession, and since I don't really care, I would like to channel my inner Hank Moody and come out swinging.

So this frame's for you, Mark Muckerman!

Since I'm really a cryptologic mathematician, I decided to, instead, respond with cipher...

```
K0vIU/axjuq63ImfkNgd/Sp8gCgIvKXvK3kSRWLHI/F5
0aNRGPP/dX410+wfgCgXpkYhVcZU8um3wUZpPeUGnNCI
TN/hrbV+yJuhfSr5qpWF+TTUKRrzoN/pNy7UeDImlMj3
aYPxTaw5hzNoLiH2hXqfSgW15shPA40pLxAVBPeIx9ct
nrp0Wuiz/LH0GuDt939QUg1gVQy/jSkP/LODAriuMyib
voCnc5ApEvyvpb/ganxpt4YZgFbJx0W+lKkPqH5aTrvJ
X6gv70JHQIygJ7KVCsa1xp26sJ0X0Qmd++3TjELxD5hU
2BehborvzJaQsd5WbpFftmaGAZcj19QcsX9JM79Z+LYI
wfWxqoJo+VWszAPF39JQe5jeGZC4Cf/MFXsxBa1xTcdB
EJo6xy0NCBDypv1H5q7L7XE/yhtYXSpdadAbafEzFmFH
9vRKRpuhNbeeql/SVPv5GN/2qSI3u7nkLNERuJE9vrYp
aTewb4fslcBTzQ+wDWEqCcGZX3hxQRn47mVN+1/F6Jee
9P2bAARJk6SSglT98GAzq/Nz5cm+ejypaSUDUaAYYrCw
yK5TYrn4EFIy7HwrNe5HtbakRxiSnXuGY7AYyMobfPp
rk08Jmb/Iup0M8EJ8hX9jltzrzx0LV492CIgvrRpxh28
/CAzs/T99Hd/p+sz2ZjzpuuT+2ukqaYuQjBu7Smbt+T8
OnMrSkUfHRlqJnqdW00PLdHcmwPFX6+/ubKAM73f8dx
SlsBkpbql0AfpVxVhn5LWXNjwtr6phI9ILs9L1+GZ9Tl
dnK6h8YzrRHp5B0hctQq1Uk/0EFV/q/YKGS5GN22X6xx0
HFLvYXtxC10d1cNtdbV0H627Qz2yG/L0unnoG+5PGFuH
y1/DtCxTtb6uWJCpUahuxTAJ3rj51PLyVdKSfHmH/9ev
rjPFjojik0JHj1qFIUDGKXAT6B8l0th0LxLo2SMBo9LBU
Sej0GcycYSu5z0pTtfPq9CpQbCxmWLYELY31Guatp53S
hXHL180QHv2yHsp966LxtFAYBis0yeIAfrkbtMQr6100
Q2T7Dhz5dDU60CwLgZj5me8uzZAe4tD030U81ebc3f5R
fg4Y8IXUj+dk5+rUKr2bPfwS8VcbW5ZW87vsBckOeHW2
ZCA8XgQN2P5ItUXrXRKU5RjIPYv4x1d007cqkw7oJpI5
8E8cp8Yp32pErNVumITIR+7+NqIr8jzeczY5dzjd0rXa
jzJSMcz78gfrR8WwQA5SDyQo7M7jhUnZjqAhEki30czD
J2MQM3mAM1bEbm+UP9iMh0JWUEJywavXJqL17zG50F5r
H5GkUlGwgWBW14rj0yYfrjP4cGmms1hCoIqkKu0wPD1x
d6k84VPg7I9gyFo4xUTpNv8+3DpxXy0Tq6e2MewZdZ7
```

Why the confusion?

- I wanted to write up my findings in the form of a research paper.
- My wife, although she no longer acknowledges it, suggested I write it up as a story, with each chapter being more revealing, allowing the readers a chance to figure out the clues.
- Some people thought they were getting a work of historical fiction and expected some well polished work of literature from an emerging author.
- The book is a work of non-fiction, told in a very, very, non-inverted pyramid style of writing, complete with the inner thoughts, musings, and red-herrings of a cryptic mathematician, who never wants to write anything else in his life.
- For instance, the first chapter is intentionally left blank.

The Bread Crumbs

- I also wanted to leave enough bread crumbs so that someone, hundreds of years from now, could figure out who the author was.
- I stegged the book with an unimaginable number of secrets and hidden meanings, for which my wife says I come across as very eclectic.
- I paid each of my four older children \$40 to read the book and, sorry Mark Muckerman, even my 10 year old son understood what I was doing.

However, my own Mother didn't understand the story

While I'm pretty sure I'm still willing to let the Mark Muckermans of the world remain in a state of confusion, my mother deserves better.

In fact, since everyone deserves to understand what really happened on Oak Island, maybe I'll write a board-book version, or maybe remove the cryptic musings of the Mathematician in the second edition, but in the mean time, I'll present the true story very plainly here.

Oak Island



The Mystery

- In the 1750s, French fisherman began settling in nearby Chester, Nova Scotia.
- The French were expelled and the British began settling in the early 1760s.
- The first British settlers were seeking treasure that was rumored to be buried in this area!
- The British Admiral, Lord Anson, is rumored to have made secret expeditions to the area.
- The early residents included the Smith and Vaughn families.
- In the 1790s, a Mr. McGinnis went to Oak Island, probably with a former slave, Samuel Ball, and I believe they were in possession of a certain map, diagram, and cipher.

The Mystery deepens

- McGinnis and Ball enlisted the help of the Smith and Vaughn teenagers to help dig in a large depression below an Oak Tree, above which they found, either a ship's block and tackle still hanging, or a branch that had been damaged by one.
- They found many signs that a big pit had been dug there.
- They found flag stones at the top, that had been moved to the location from a nearby river.
- They found a stone with cryptic etchings that made them and others increasingly superstitious.
- They later concealed the fact of this stone because the inhabitants refused to help them from "some kind of superstitious dread" and probably because they had deciphered it and wanted to keep its meaning secret.
- Every ten feet, they found wooden platforms.
- At around 30 or 40 feet they stopped for some unexplained reason.

- They formed a treasure seeking company and continued to dig to 80 or 90 feet.
- Running out of funding, and still desiring to go deeper, they claimed they found a stone with etchings which was deciphered to “Forty Feet Below Two Million Pounds Are Buried” .
- I believe this is the stone they found at the surface (the 0-foot stone) which motivated them to stop digging after failing to find anything 40 feet below.
- Continuing their dig resulted in massive flooding back to the 30 or 40 foot level.
- All subsequent attempts to unearth anything have failed.
- Of particular note, several pieces of parchment (one with the letters “vi”), leather book bindings, and some human bones have been recovered over the hundreds of years.

Theories

- Captain Kidd's Treasure?
- The Masons became interested in the burial, believing that French treasure, possibly Crown Jewels, were buried there?
- Shakespeare's Works?
- Religious Artifacts?

I first learned about Oak Island when I was a kid, reading my Grandmother's Reader's Digests.

Reader's Digest (1965)

138

THE READER'S DIGEST

January

Nova Scotia. The results were dramatic.

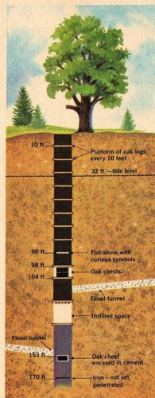
At 98 feet down, just where the crowbar had hit a solid mass in 1804, a horse-driven post auger (which picked up a sample of anything it passed through) pierced a spruce platform. After dropping through an empty space, it cut into four inches of oak, 22 inches of metal pieces, eight of oak, 22 of loose metal again, four more inches of oak and six of spruce, and then into deep clay. To the drillers this suggested an exciting prospect—a vault containing two chests, one atop the other and laden with treasure, perhaps gold coins or jewels. Moreover, the auger brought up a tantalizing sample of what might be there: three links of a gold chain!

A second 110-foot shaft was dug in 1850. It also flooded. But this time a workman fell in and came up sputtering, "Salt water!" Then someone noticed that the water in the pits rose and fell like the tide. This discovery jogged old Tony Vaughan's memory: years before, he had seen water gushing down the beach at Smith's Cove—520 feet from the Money Pit—at low tide.

The treasure hunters stripped the sandy beach, searching for a hidden inlet of the sea. Under the sand, to their astonishment, they found tons of coconut fiber and eel grass on a stone floor that stretched, 154 feet wide, the full distance between high- and low-tide marks. More digging uncovered more surprises: five rock-walled box drains slanted in from

the sea and down, converging on a line aimed at the Money Pit.

In effect, the beach acted as a gigantic sponge to soak up tidewater and filter it into a conduit. This con-



A very interesting and fortunate series of events recently happened that drew me into the Oak Island Mystery.

In the book, I mention these very cryptically, hoping the reader will see the significance later. I hate those moments when directors do those big flash back reveals, so I also left the reveals as an exercise for the reader.

Here, in these slides, I'll try to make the relevance even more clear.

- During the summer of 2018, I was visiting Bletchley Park and the castles of Northumberland. I stayed above a few pubs.
- At Bletchley, I heard an interesting quote that stuck with me. The most significant Polish breakthrough: that it was best to put mathematicians to the task of breaking codes and solving enigmas. This later helped motivate me in my effort to solve the Oak Island enigma.
- I also wrote a simple computer program at the adjacent computing museum that became very symbolic for me later, which I'll expound upon toward the end of the slides.
- In Alnwick, I stayed in the Blue Bell Inn. It was crazy cheap and had what turned out to be an amazing breakfast.
- There were some classic books in my room and one was a collection from the Baltimore author, Edgar Allan Poe.
- I ended up reading the Gold Bug for the first time in my life (even though I had previously won a Gold Bug award!).
- The Gold Bug is a story about a cipher and pirate's treasure!
- I also saw a building housing a centuries-old curse...

Blue Bell Inn



Curse of “The Dirty Bottles” at Ye Olde Cross, Alnwick, Northumberland



Interestingly, *Northumberland* turned out to be the name of Duc D'Anville's flag ship, and I now suspect that there was something to worry about in *Northumberland's* “Dirty Bottles”. More on this later.

- In Bristol, where I saw some amazing Banksys and a lot of Gromits, I stayed above the Famous Royal Navy Volunteer (also an interesting name in hindsight).
- The “Volley” is right by the Llandoger Trow, also a pub I’ve stayed above.
- Legend has it that Robert Louis Stevenson’s Admiral Benbow Inn from “Treasure Island” was inspired by this pub, and that Daniel Defoe met Alexander Selkirk there, the inspiration for Defoe’s “Robinson Crusoe” .
- On my birthday, August 24, at lunchtime, I rushed home from St. Nicholas’s Market to my rented flat above the “Volley” to catch a show, about another curse, that I saw advertised the previous night, one that intrigued me, and reminded me of the Reader’s Digest article!

Famous Royal Navy Volunteer



Llandoger Trow



There's been a rumor of a curse that 7 treasure seekers would have to die before the Mystery of Oak Island is revealed.

If you count Fred Nolan, a contemporary searcher who gave his whole life to the mystery, 7 people have now died.

The History Channel doesn't count poor Fred because the show is still running.

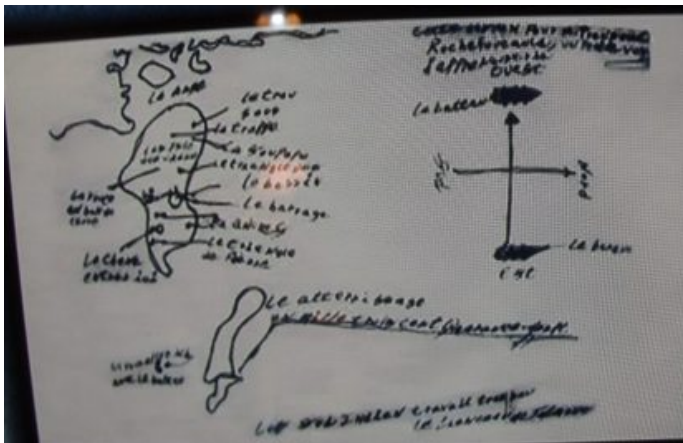
Use-or-Lose

- I flew back home the next day.
- I realized I had more than a month of Use-or-Lose time I had to take off from work.
- I started watching every episode of the History Channel's show from the first to the last season.
- The whole time I was convinced nothing happened, that the treasure seeking companies were out for pump-and-dump profits.
- Around the end of the last season, the Lagina brothers began unearthing evidence that corroborated the early “vi” parchment.
- They documented a map, diagram, cipher and a new ship's log.
- I now knew that something must have happened on Oak Island.
- I read on-line that the brothers were thinking of canceling the show.

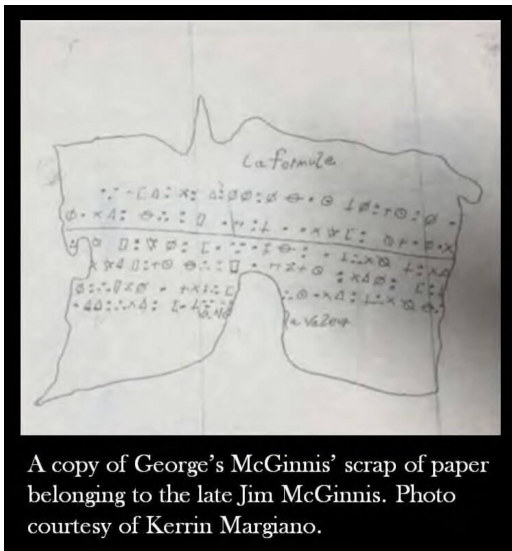
My Research begins

- I watched every episode during August 31, 2018 - September 3, 2018.
- September 4, 2018, I downloaded copies of the map, diagram, and cipher.
- I found partial transcripts of the ship's log and made my own screen shots from the show to transcribe even more.
- Since the diagram had French annotations, I assumed it was likely the cipher was French, so I installed /usr/share/dict/french which contains 139719 words.
- I found an on-line 18th Century French/English Dictionary.
- I installed lots of browser plug-ins for translation and used google translate and google earth extensively.

The Diagram



The Cipher



A copy of George's McGinnis' scrap of paper belonging to the late Jim McGinnis. Photo courtesy of Kerrin Margiano.

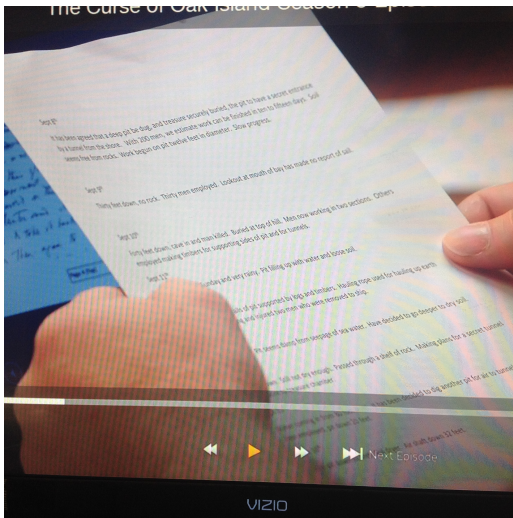
The Captain's Log

September 6

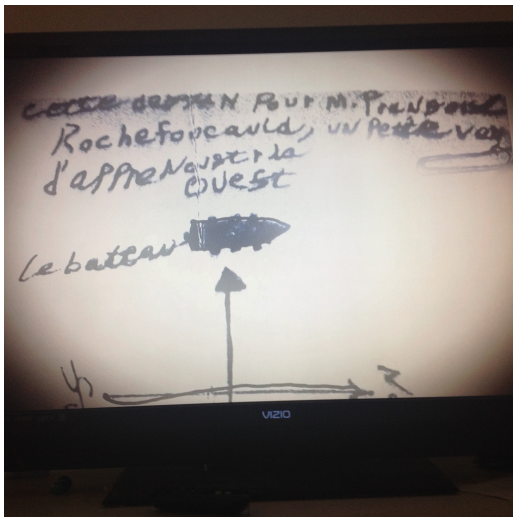
Enter a deep bay southwesterly of Chebucto Bay. Still no word of D'Anville and the weather being clear we set sail turning southwesterly along the coast past many rocky islands. At midday, we reach a deep bay with several hundred small isles wooded to the shore. The wind dying down we anchored for the night. The great quantity of treasure on this vessel makes it unwise to jeopardize it in any engagement with the enemy.

...

Screenshot of Captain's Log



Screenshot of Diagram Zoom-in



My First Theorem

- I started trying to prove that all of this was a hoax, while trying to explain the new evidence of bones and parchment.
- I deciphered the cipher and found it to be consistent with the so-called 90 foot stone.
- The two ciphers contain real plain text, relevant to a supposed buried treasure.
- The cipher read: “Do not dig in the earth past forty feet! With an angle of forty-five degrees is the shaft at five hundred and twenty-two feet. You enter the corridor which has a thousand, sixty-five feet to reach the chamber.”
- Trying to reach a contradiction, I assumed the documents were real and started scrutinizing them.

- I viewed the google satellite imagery and overlaid it with the map and found them remarkably consistent.
- Except that the water level was much lower at the time the map was constructed, leading to a very early dating—hundreds of years ago.
- The satellite imagery is consistent with the Captain's Log!
- The Captain's Log and Diagram both reference Duc D'Anville and the September date.
- This dates the material to September 1746 and Duc D'Anville's mission was in this area.
- I first hypothesized that the pit was for a weapons cache or food store for Duc D'Anville's mission.
- However, both mention treasure, along with the early settlers.
- I couldn't find any reference to a great treasure in Duc D'Anville's mission.

- I assumed, to the contrary, that there really was treasure buried on Oak Island.
- The 0-foot stone and cipher seemed to be helpful clues for someone to find the treasure.
- Both reference 40 feet.
- I realized that the measurements seemed accurate and that the treasure chamber was never in the Money Pit, it was off a corridor, as is depicted on the Diagram!
- When the concealers hit the underground water supply, they decided to go horizontal instead, resuming their operations from the 40 foot level.
- I hypothesized that if I was on the Island, and didn't know if I was on the right Island, or right place on the Island, what clues would I appreciate being left for me?
- There were large boulders on the Island that the early treasure seekers blew up that had carvings on them.
- I realized that this was also cipher, most likely pointing the seekers to the right place on the Island.

Corroborating Cipher with Provenance!



- I then overlaid the property layout of Oak Island.
- Samuel Ball purchased property above the treasure chamber!
- Ball realized where the vault really was, everyone else focused on the “You Enter Here” and then kept digging too deep, and in the wrong place!
- Ball is said to have come into some wealth, and sold some old coins.

- I eventually tracked down the Le Vazeur reference on the cipher.
- He turned out to be a sculptor that had mysterious activity during this time period!
- He was in the Duc D'Anville mission!
- I found the ship he was on—Le Fort Louis.
- I tracked down “La Deese”: a ship anchored at Oak Island during this time!
- The captain of this ship was Jean Hiriard, Sr.
- Jean Hiriard, Jr., registered a schooner “The Two Angels” which was referenced on the Diagram!
- Le Fort Louis had mysterious activities during this time!
- I found an autobiography (Maurepas's) that placed this ship exactly in the right area, at the right time, full of intrigue.

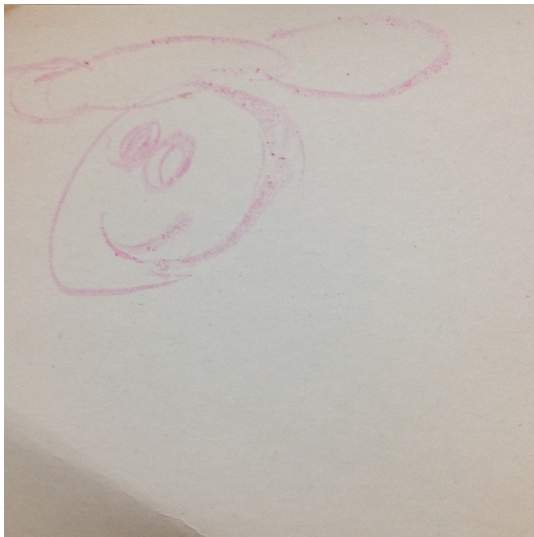
- I can now corroborate all of these documents with even more data.
- I had a critical mass of data which let me unravel everything else.
- I read through thousands of pages of archive material, hundreds of websites, and finally realized exactly who was involved and what they were doing.
- After a week of very intense research, I knew I had solved the Mystery, once and for all.
- On September 11, 2018, I sat down to write up my research.
- I still didn't understand the reference to the two Angels but knew it was important.
- The Angels were also referenced in the archived letters.
- That night, my youngest daughter, knowing that I was obsessed with the Pirate Jean Hiriard, began drawing the head of a pirate.

This is My Little Angel



Her name is French, but also a term used in Mathematics (Hg) and a compromise on the spelling...

Her Inspirational Drawing



- I asked her what that was on the pirate's head and she said it was "his Pirate's hat."
- Looking at it later, while I was writing, the hat resembled two halos and I finally realized that the two Angels were halos above the Island.
- I looked back at the Diagram and could see the two halos above the Island.
- I looked at the satellite imagery and...



- I finished writing the book around October 11, researching more details and finding lots of unexpected corroboration as I was writing.
- My printers and the Library of Congress were happy with me by October 31.
- Every time I do a little more research, I find a little more corroboration.
- I recently found an early video of a searcher who claimed the drainage and excavation techniques were clearly French, the Laginas recently found a very old French Fleur-de-lis on Oak Island, and evidence that there is some fill-in of a possible chamber near Samuel Ball's property!

- At this point, you should really read the book.
- The book is supposed to cost 17⁴⁶ in every currency because I'm a number (and now, provably, a conspiracy) theorist.
- If you want a copy, and you know me, I can send you one at my cost (\$5 including shipping).
- I'm also going to make the ebook free as often as possible (it's \$2.99 all the time).
- The following is a quick summary of exactly what happened, spoilers and all.

La Grande Societe

- An organization called La Grande Societe conspired to overthrow the King of France.
- The head of the conspirators was Maurepas, the French Minister of the Navy, also in charge of the French Colonies in Canada, and Secretary of the State to the House of the King.
- Maurepas's father had the same role before him, and the father purchased the office with the right to pass it on to his son.
- Maurepas's father placed a family in the colonies, the De Goutins, who helped turn over the French colonies to the British.
- Maurepas took over for the father in the late 1730s and saw to the rise of Francois Bigot, the head of the conspirators in Canada, and the eventual scapegoat for the conspiracy.

Motivations

- The conspirators weren't interested in France controlling the colonies, they were mainly interested in the story their loss would tell—spinning a narrative of the weak and ineffective rule of kings.
- The conspirators wanted a Republic. They wanted to be ruled by the noble Parlement.
- The conspirators repeatedly helped turn over control of the colonies to the British, and helped control the outcome of the King's expeditions.

Oak Island Heist

- Around 1743, Maurepas hatched a plan, which the King consented to, to engage in price fixing and other more profitable schemes.
- Maurepas arranged for the son of a master sculptor to intern at the Navy, supposedly to design sculptures for ships.
- In reality, the sculptor was helping counterfeit British coin!
- A shipment of 2,000,000 pounds of counterfeit coin was arranged to be sent to New France, the French Colonies, to be used for bribes and to purchase the outcome of the war.
- The conspirators designed a plan to steal the counterfeit money right out from under the King.
- The plan went awry in 1745, but succeeded in September 1746, during the Duc D'Anville mission (a show of amazing force against the British, requested by the King of France, but destined to become a disaster by the conspirators)

Oak Island Banking

- The conspirators poisoned the mission with tainted provisions, designed a separation of the treasure ship from the fleet, and carried out an elaborate plan to actually separate the money from the King—digging a pit and treasure chamber to conceal and safeguard the counterfeit coin.
- 200 Navy midshipmen were used in the excavations.
- After burying the money, a great quantity of gun powder was loaded on Le Fort Louis, and the midshipmen were sailed out to sea, where the ship was blown to pieces, concealing the conspirator's activities.

Oak Island Inflation

- The conspirators began a counterfeit money laundering effort that took decades.
- The activities are recorded in historical first hand accounts.
- Goods were bought in the American colonies using the counterfeit coin.
- The goods were sold back to the King of France, for the French colonies use, often at a mark-up.
- This process created huge inflation in England and France!
- This inflation is also well documented!
- 2,000,000 pounds back then would have been worth Billions of dollars, maybe even a Trillion dollars today, if properly invested.

Pour Angelique

- Apart from the 200 lives that were taken in the cover-up, thousands died from the tainted provisions to ensure that the King's mission, Duc D'Anville's expedition, failed.
- Feeling a personal responsibility for telling the stories of all those lives that were taken in the creation of the Money Pit and in carrying out the designs of the conspirators in their pursuit of a Republic, motivated me to write up my research.
- The infinitely looping Hello World program that I really did write at the computing museum at Bletchley Park and left running that day, became a symbolic tribute to those people finally being able to tell their story.

Captain Kidd and Free Mason Connection

- In determining the origin of the Captain Kidd and Free Mason relationship to the legend of Oak Island, I tracked down evidence that Jean Hiriard Sr, was in fact, Robert Culliford.
- “When the first settlers from the United States came to Chester, they brought with them a story that an old sailor, while on his death bed, stated that he belonged to Captain Kidd’s crew, and that he helped to bury on an Island, somewhere in that neighborhood, about two millions pound value of treasure, but that he had never dared to avail himself of the secret for fear of the ‘law’ taking hold of him as a Pirate.”

Culliford's Dying Words

- Culliford recorded evidence of this in a ballad that he wrote on his death bed!
- Culliford stowed the map of Oak Island that was used in the Duc D'Anville mission, the Diagram of the Money Pit and the Cipher on his ship. In 1747, Culliford's ship was attacked by a British fleet. The fight was amazing and Culliford fought bravely, but eventually surrendered after seeing 14 British ships! This fight and the Oak Island heist are referenced in Culliford's "Broadside ballad". The British captain took over, repaired and refitted Culliford's ship. He interrogated Culliford, before killing him. It turned out that this Captain was a Grandmaster of the Masonic Temple! This is how the Masons became aware of the Oak Island treasure. Culliford's map, diagram and cipher eventually made it into the hands of the McGinnis family.
- The rest is history!

Questions? stirhaven@gmail.com

Thanks!