



Overview: Mining in NWT & Nunavut Global Challenges, Regional Solutions

To: 2015 PNWER Economic Leadership Forum #5: Mining

By: Tom Hoefer, Executive Director, NWT & Nunavut Chamber of Mines

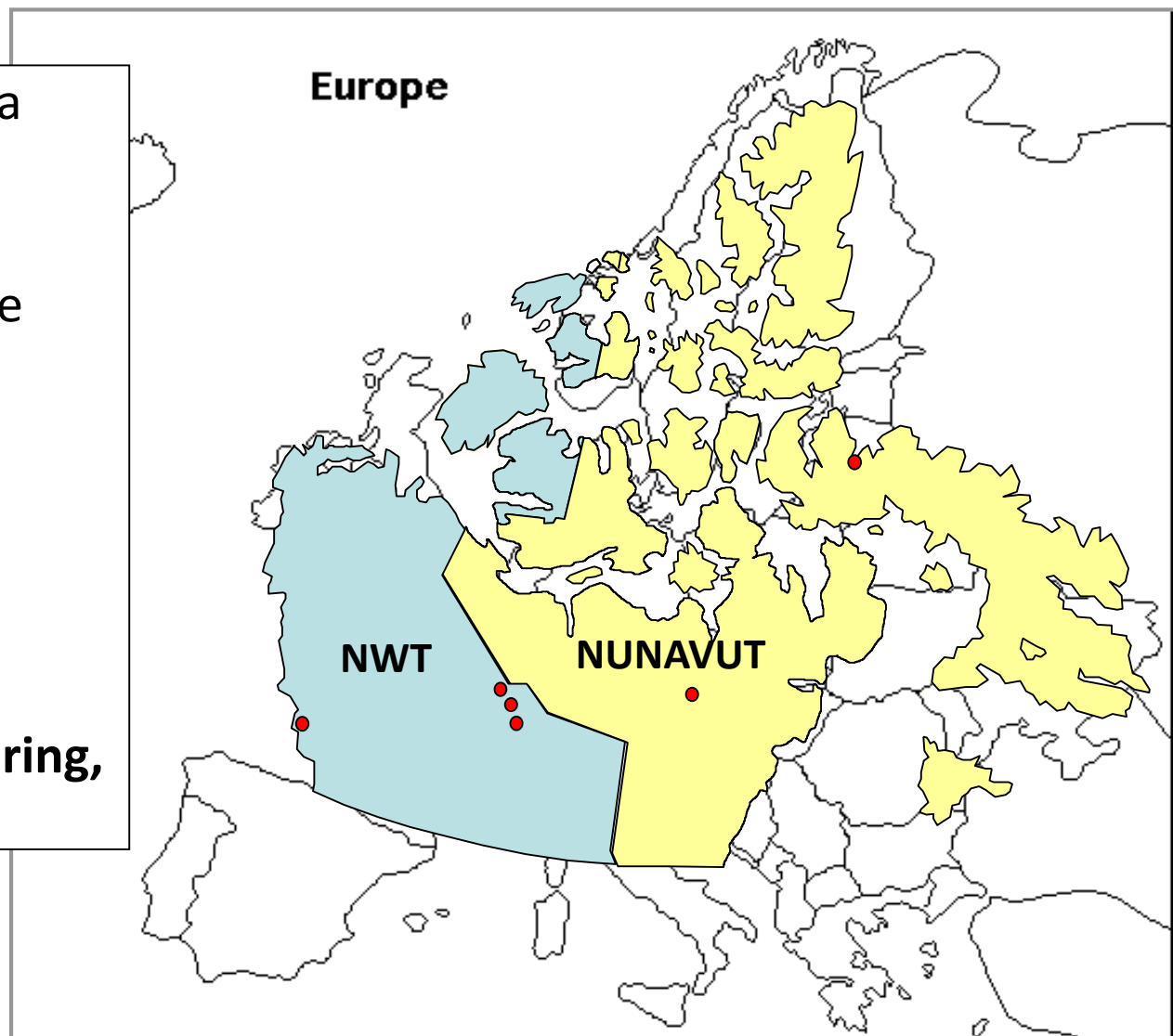
November 17, 2015

Key Messages

- Mining is our economic advantage
- Mining has been and is important to our economies
- We have more opportunities before us
- But, we face challenges
- We are not victims – there are actions we can take

Mining is our economic advantage: GEOGRAPHY

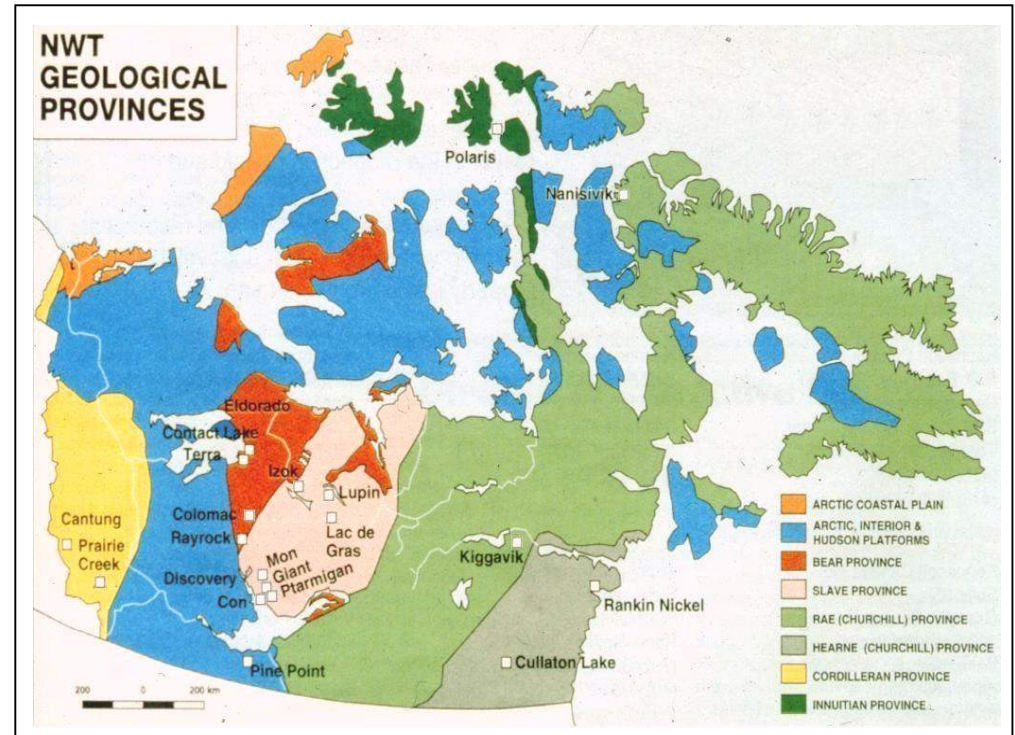
- Huge: 1/3 of Canada
- Remote
- Challenging Arctic conditions & climate
- Underdeveloped infrastructure
- Small population
- **Limited options for farming, forestry, ranching, urban growth, manufacturing, etc.**



Area of NWT + Nunavut = Norway, Sweden, Finland, Denmark, France, Germany, Poland, Spain, Portugal, Italy combined.

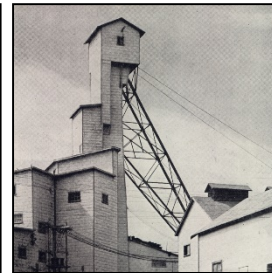
Mining is our economic advantage: GEOLOGY

- 8 geological provinces
- Diverse mineralogy
 - Gold, silver, diamonds, lead, zinc, uranium, tungsten, rare earths, cobalt, bismuth, nickel, copper, iron, etc.
- Under-mapped & remote means under-explored
- This equals tremendous mining opportunity



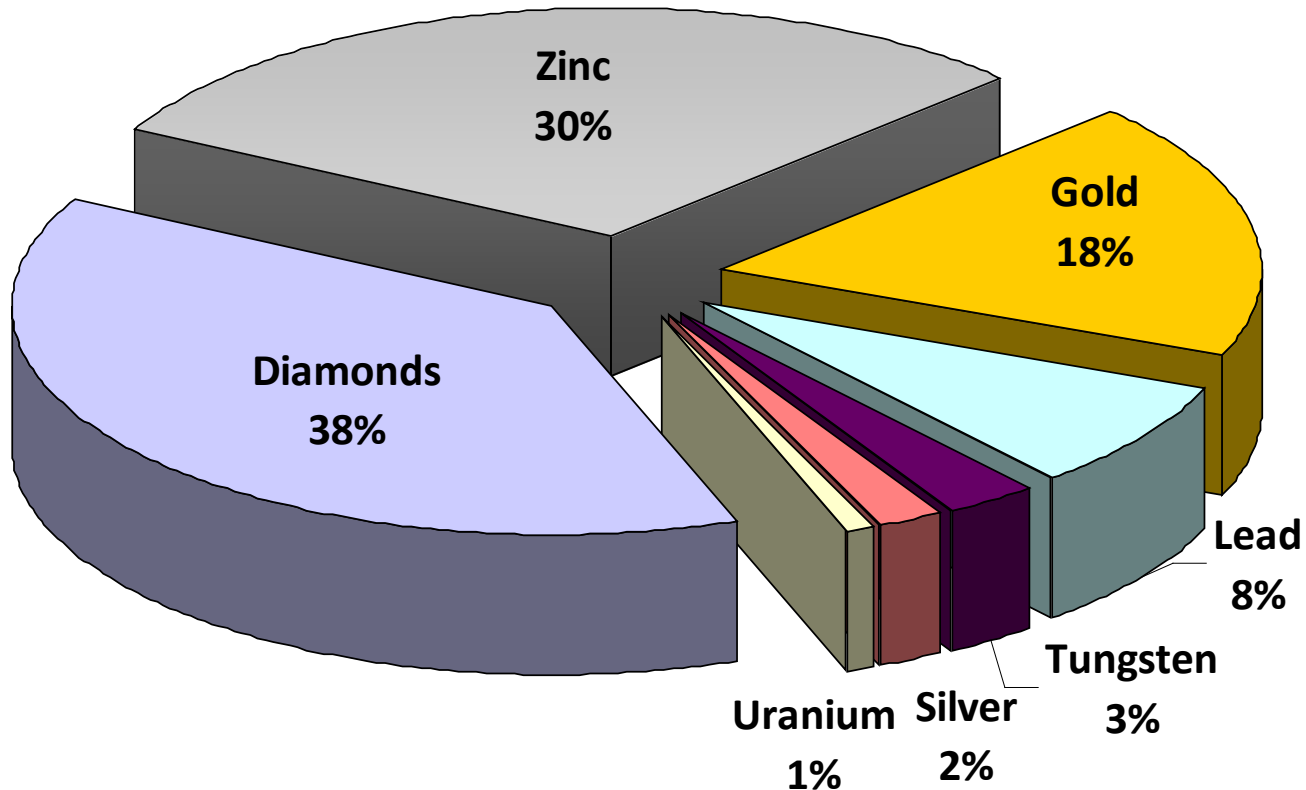
History of mining

- 1930s - Eldorado (uranium), Con, Negus, Rycon (gold)
- 1940s - Giant, Thompson-Lundmark (gold)
- 1950s - Rankin (nickel), Discovery (gold)
- 1960s - Pine Point (zinc-lead), Cantung (tungsten)
- 1970s - Nanisivik (zinc)
- 1980s - Polaris (zinc-lead), Lupin, Cullaton Lake (gold)
- 1990s - Colomac (gold), Ekati (diamonds)
- 2000s - Diavik, Snap Lake, Jericho (diamonds)
- 2010s - Meadowbank (gold), Mary River (iron)



Historical mineral production

– Over C\$60 billion since 1932 –

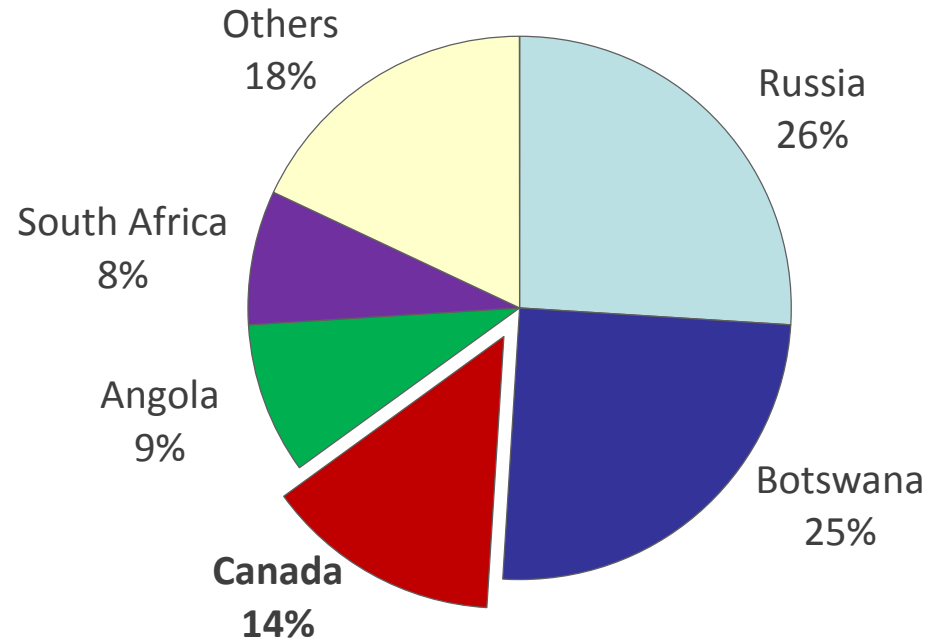


Current & Past Producing Mines: Ekati • Diavik • Snap Lake • Meadowbank • Con • Giant • Lupin • Polaris • Nanisivik • Pine Point • Cantung • Discovery • Rankin Nickel • Rayrock • Outpost Island • Supercrest • Eldorado • Ruth • Terra • Norex • Silver Bay • Colomac • Tundra • Camlaren • Contact Lake • Ptarmigan • Tom • Mon • Cullaton Lake • Salmita • Hope Bay • Negus • Thompson-Lundmark • Rich • El Bonanza • Rycon • Bullmoose

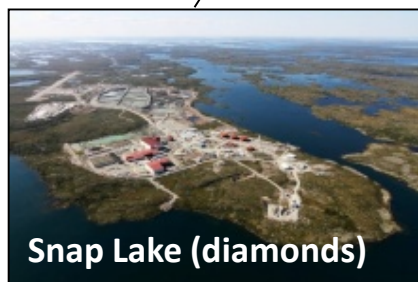
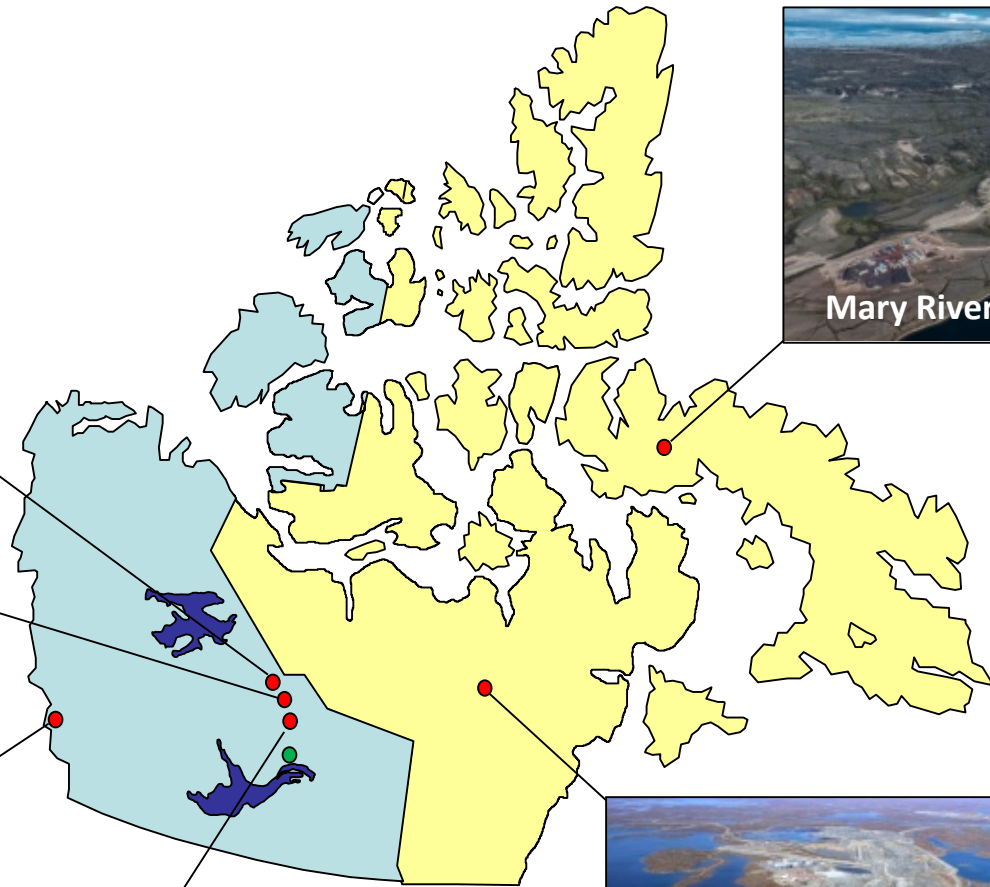
Diamonds – we are world leaders today

- The Northwest Territories by itself is the world's 3rd most valuable diamond producer

Value of Global Diamond Production 2014

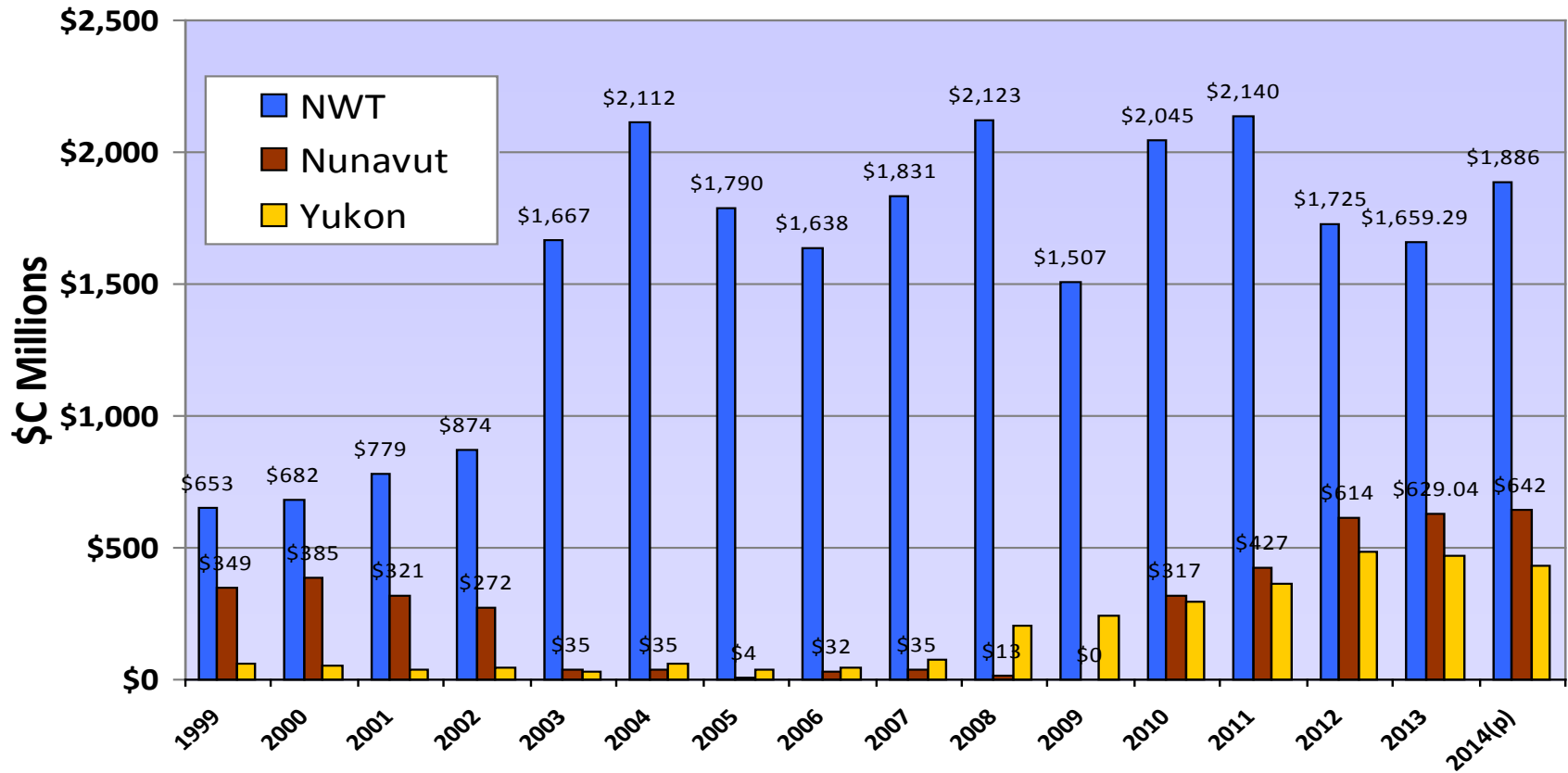


Today, mineral production is from 6 mines



Our mines create huge value

NWT, Nunavut and Yukon Mining Production



Natural Resources Canada – March 2015

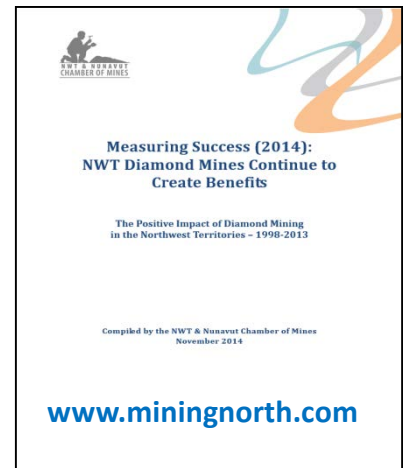


- NWT: Diamonds are the most significant contributor with lesser tungsten & copper
- NU: Gold is the most significant, with some silver (iron will come in 2015)

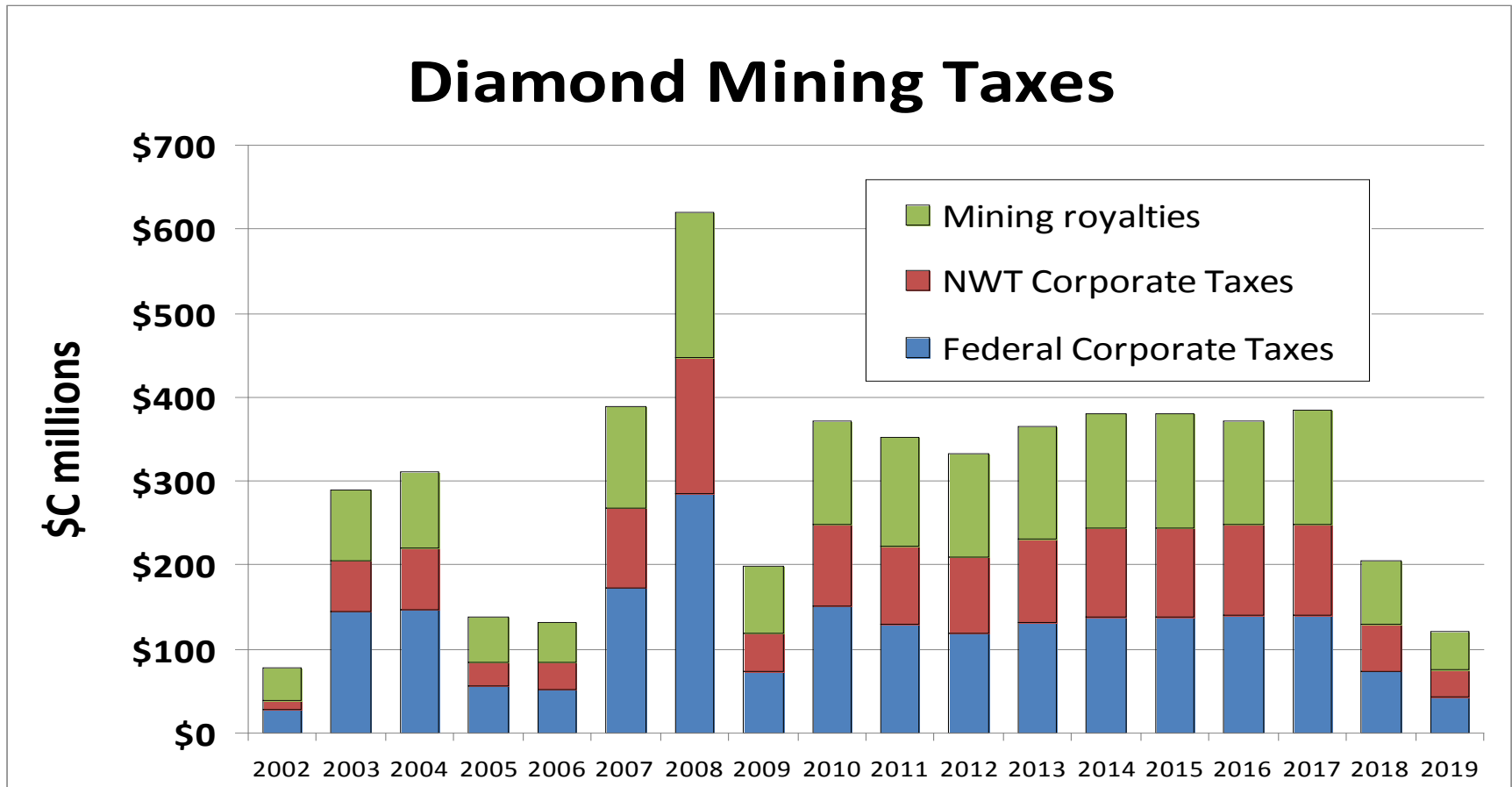
Our mines create people & business success

(Note: NWT diamonds example ... Nunavut benefits similar)

- 22,000 person years northern mine employment
 - Today over 1,400 workers, 50% Aboriginal
 - Mining – largest employer of Aboriginal people
- Over \$11 billion in northern business
 - \$5 billion with Aboriginal businesses
- \$100 million plus to communities in IBA payments, scholarships, donations



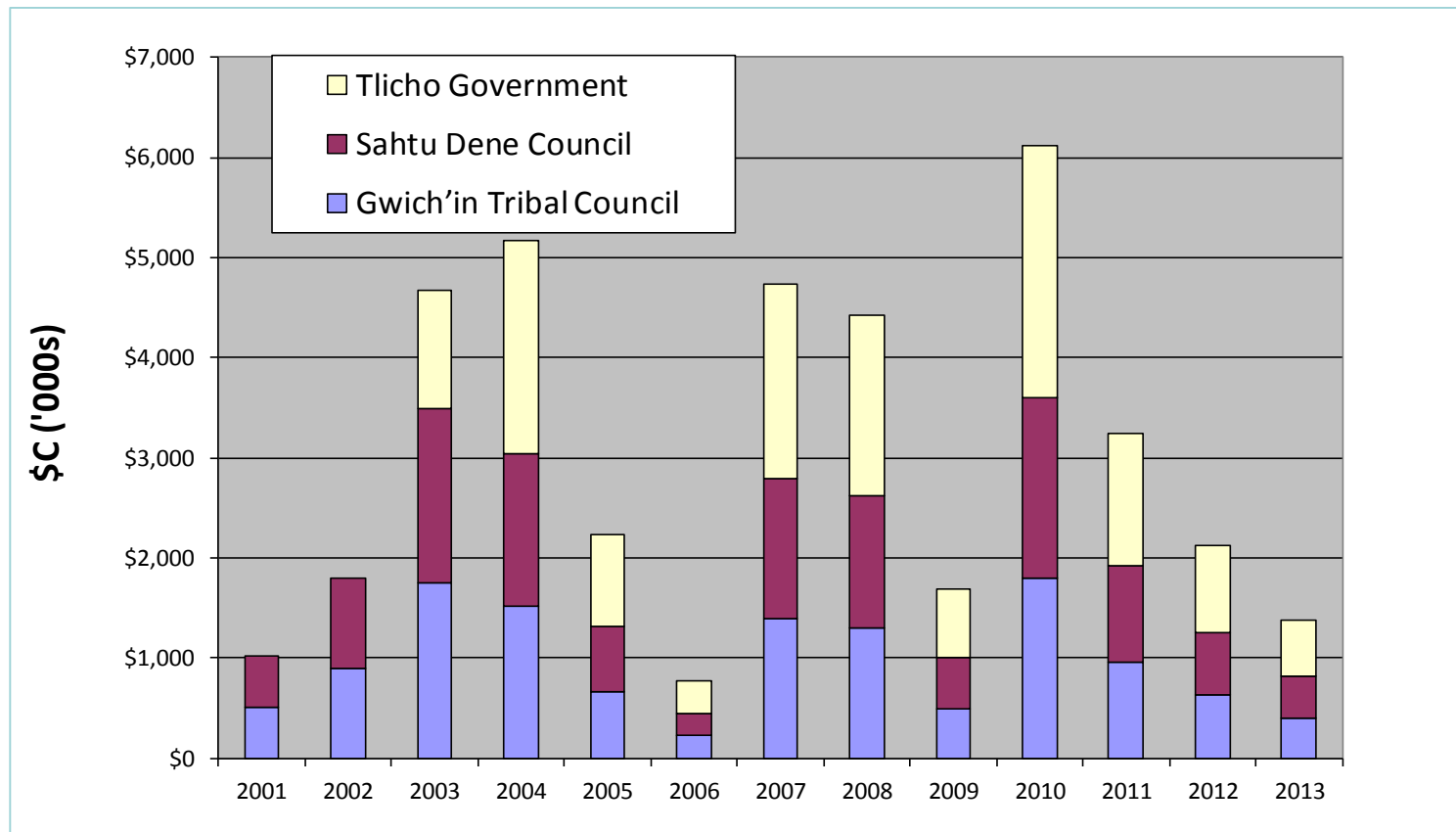
Our mines pay significant taxes



•Source: GNWT – ITI Economic Model

- **AND THAT'S NOT ALL!**
- **ALSO PAYROLL, INCOME, FUEL, & PROPERTY TAXES!**

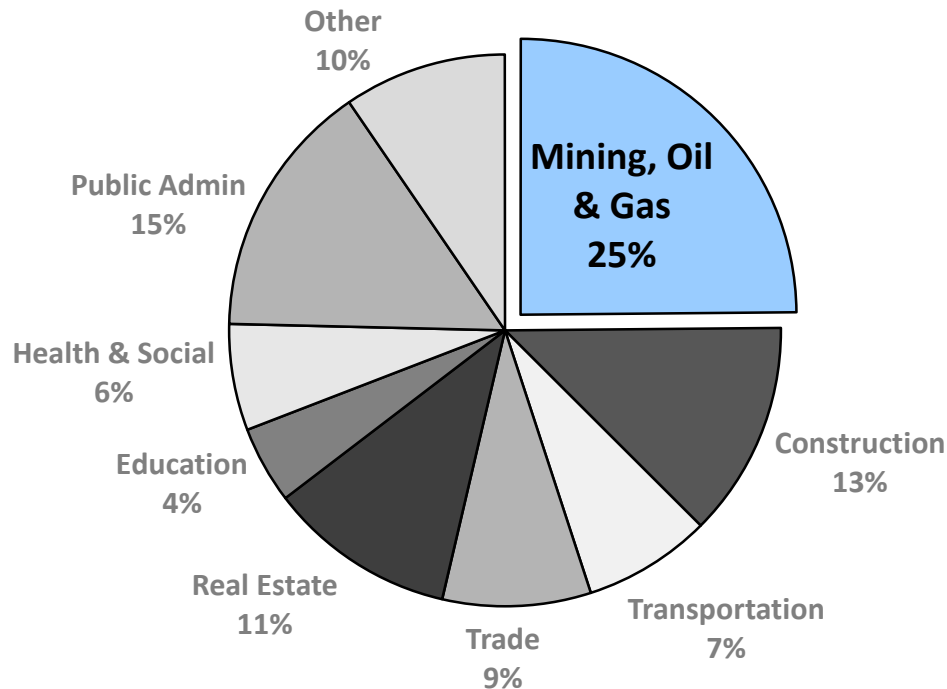
Aboriginal governments receive royalties, too



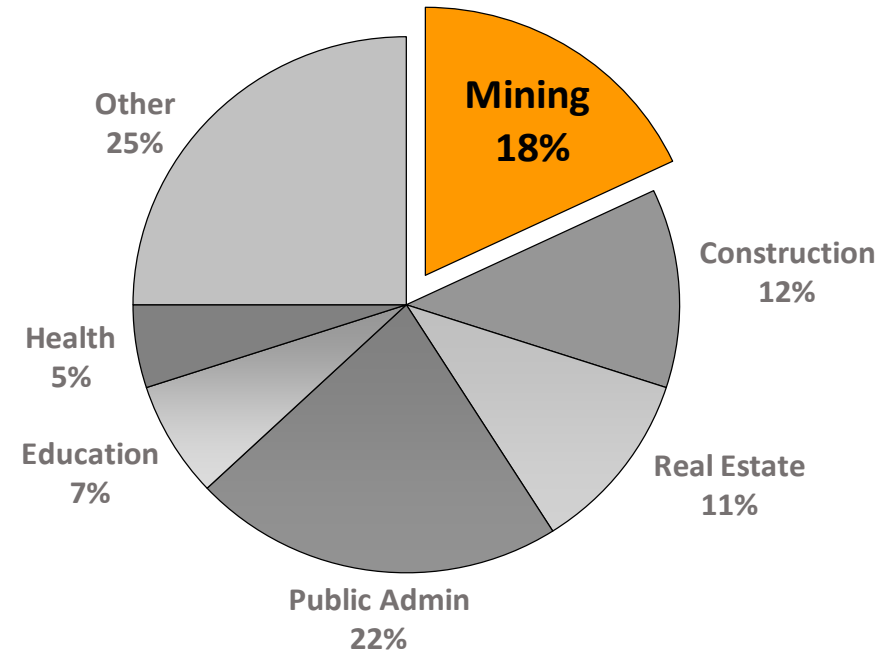
- NWT: Over \$39 million in diamond resource royalties have been shared with settled Aboriginal claimants. Even more royalties are now being shared under NWT devolution arrangement.
- Nunavut: Inuit are collecting royalties from their own private lands. They are the largest private land holder in the world.

Mining – largest private sector contributor

NWT GDP (2014)

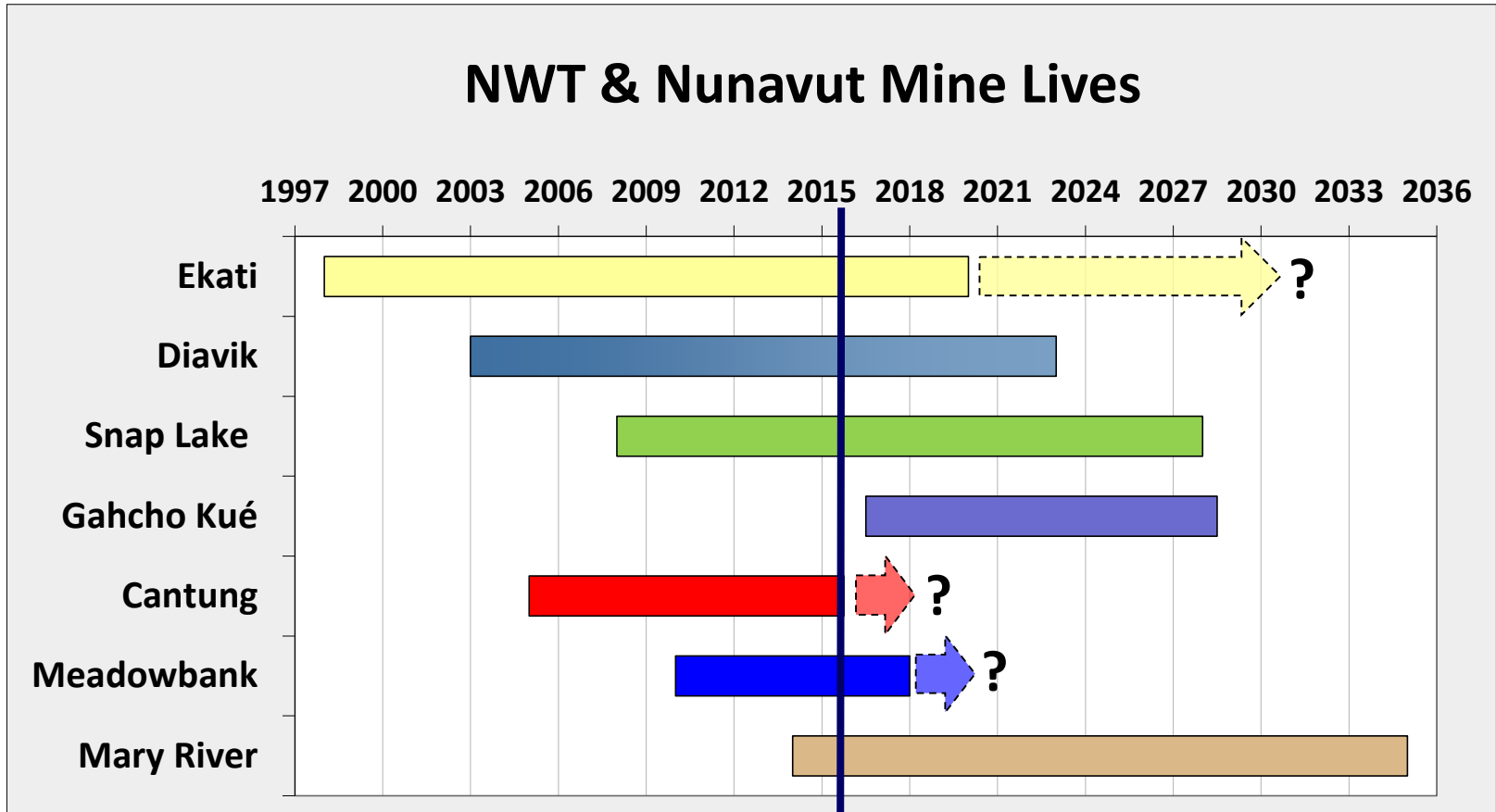


NUNAVUT GDP (2014)



- **Mining's contributions are even larger** with spending in other sectors of the economy, eg, construction, transportation, real estate, trade, etc.

Mine lives are variable



- Mines don't last forever
- To sustain and grow mining benefits, we must protect and attract investment

Real NWT opportunity: Gahcho Kué diamond mine

- World's largest and richest new diamond project
 - Capital cost \$859 million
 - 700 construction workers
 - 400 operations workers
 - Operating costs \$218m annually for 12 year mine life
- On plan and budget for first production H2 2016
 - October 2015, construction over 70% complete
 - De Beers 51%, Mountain Province 49%



Real NWT opportunity : more robust Diavik mine

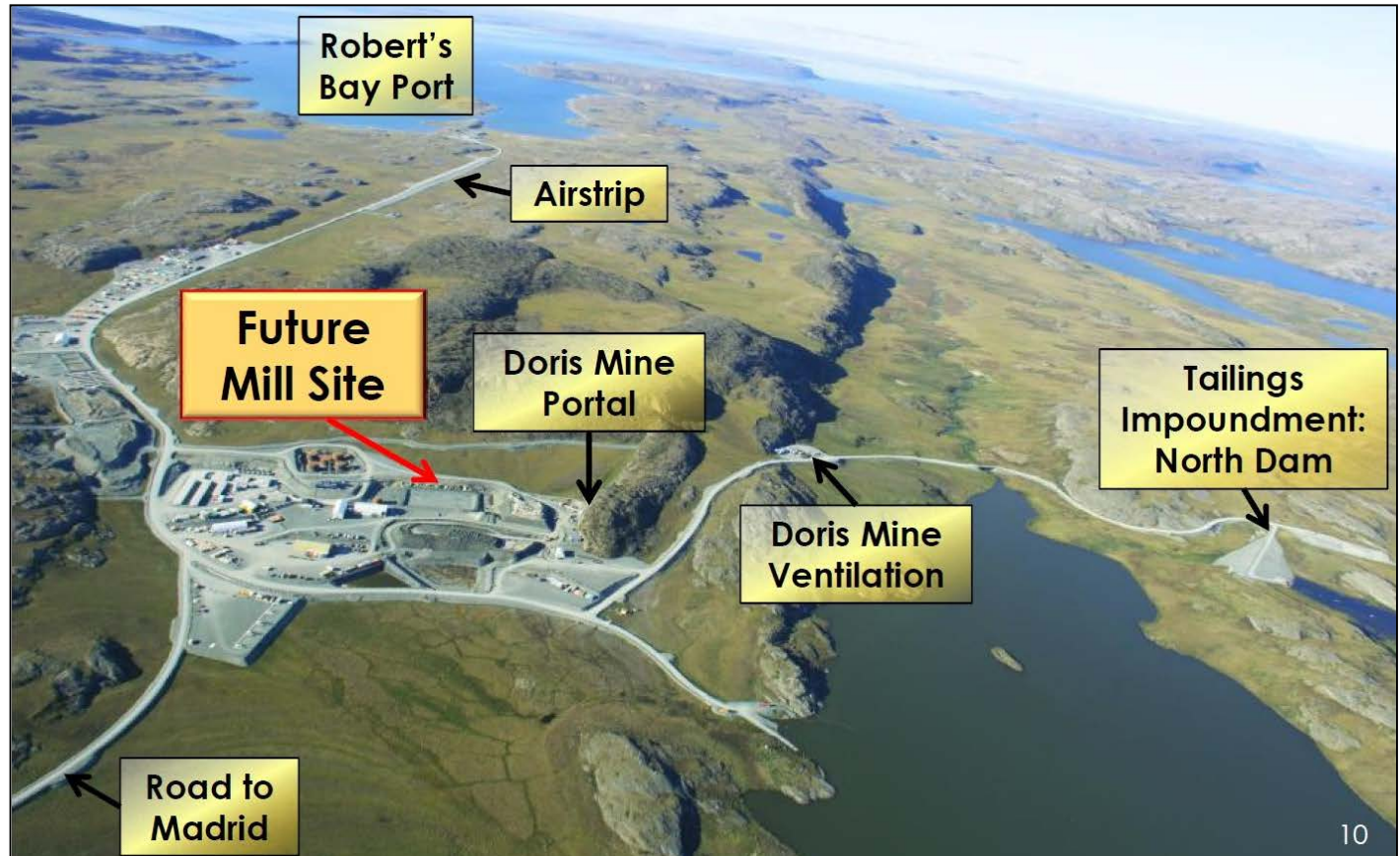
- US\$350 million to develop A21 deposit over 4 years
- Diamond production planned for late 2018
- **Does not increase mine life of 2023**
 - But makes operation stronger to end of mine
 - Brings construction jobs and business spending



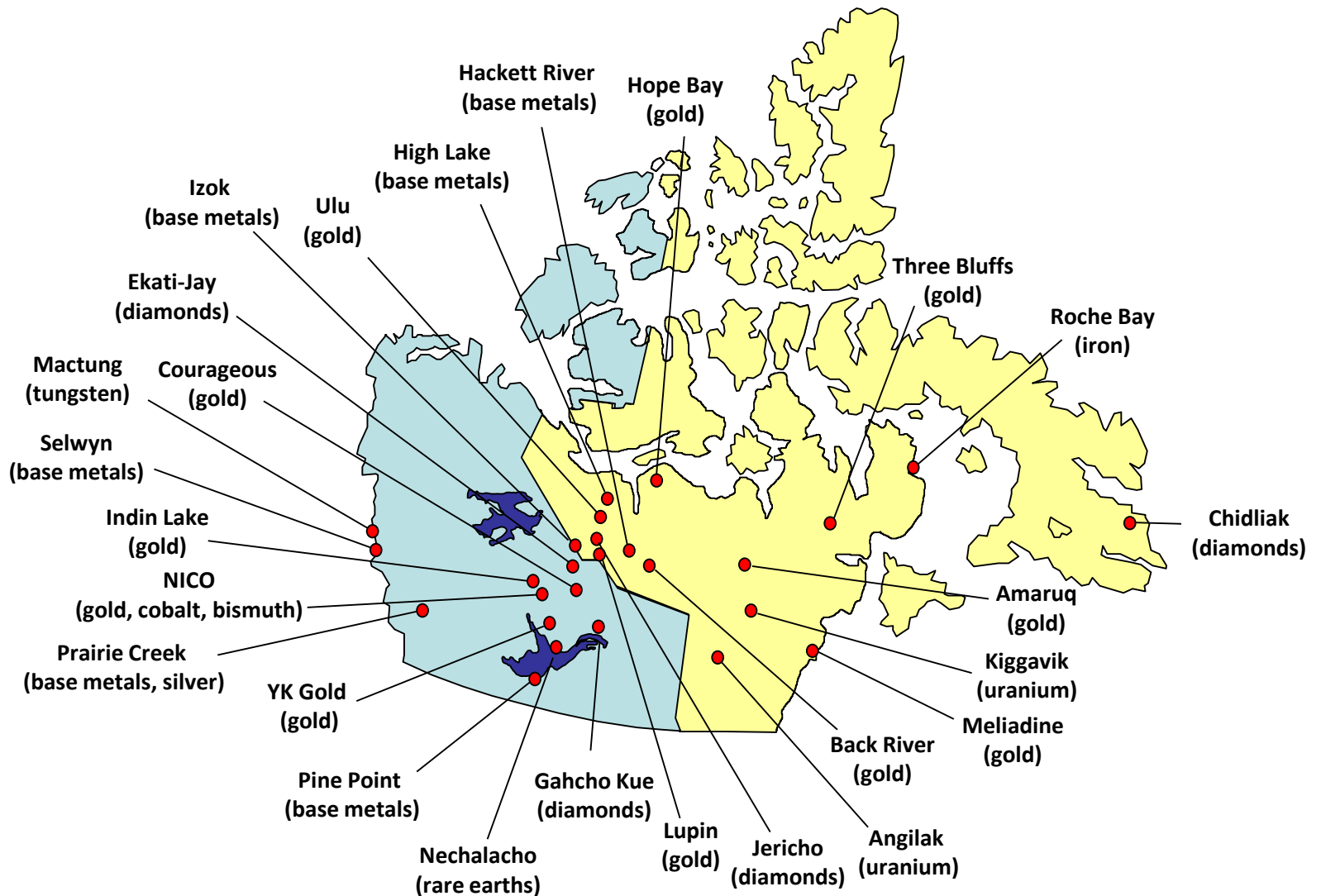
Diavik owners have approved a US\$350 million investment to mine its fourth kimberlite pipe, an orebody called A21, shown at far left, using similar dike technology as shown around the A418 and A154 pipes. *Courtesy Diavik Diamond Mines Inc.*

Real NU opportunity: Hope Bay gold mine

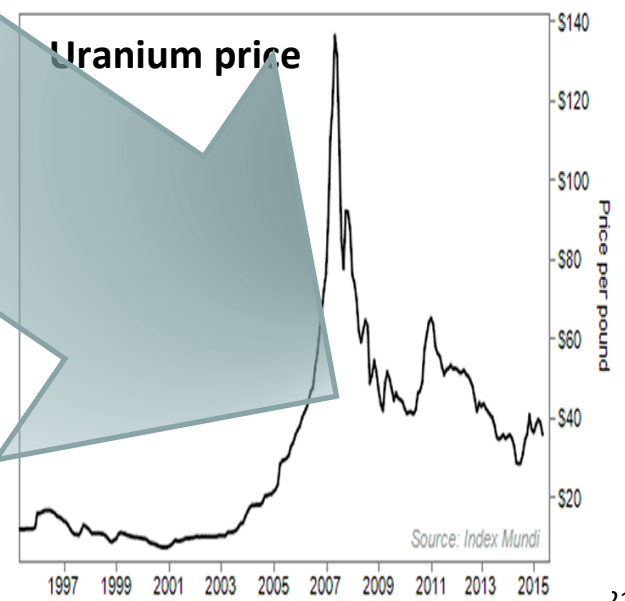
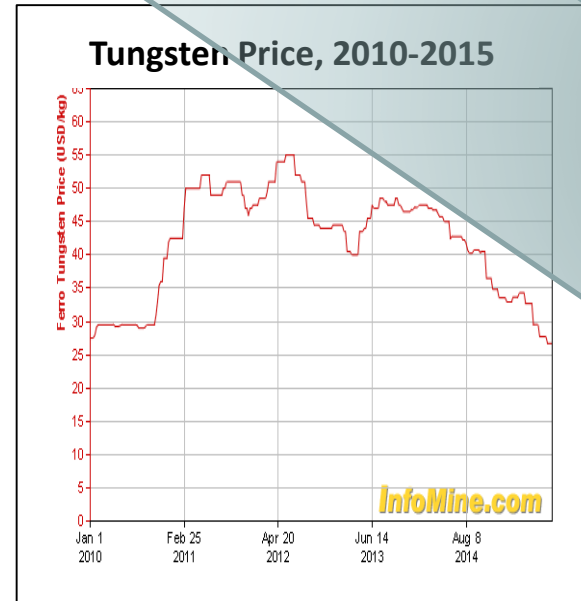
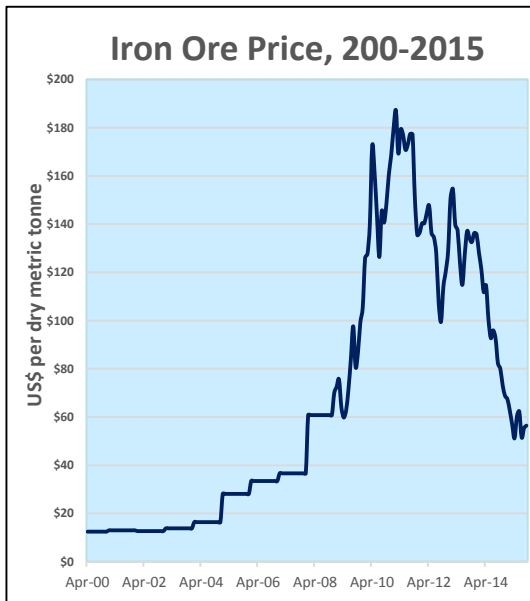
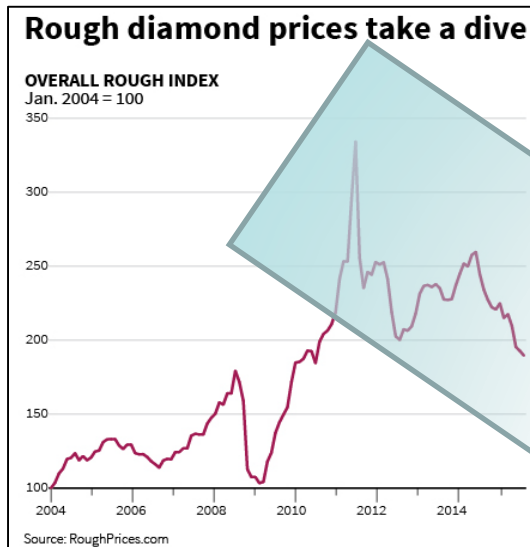
- Construction underway
- Production from first of 3 deposits in H2 2016
- TMAC Resources



Potential Opportunities – advanced deposits

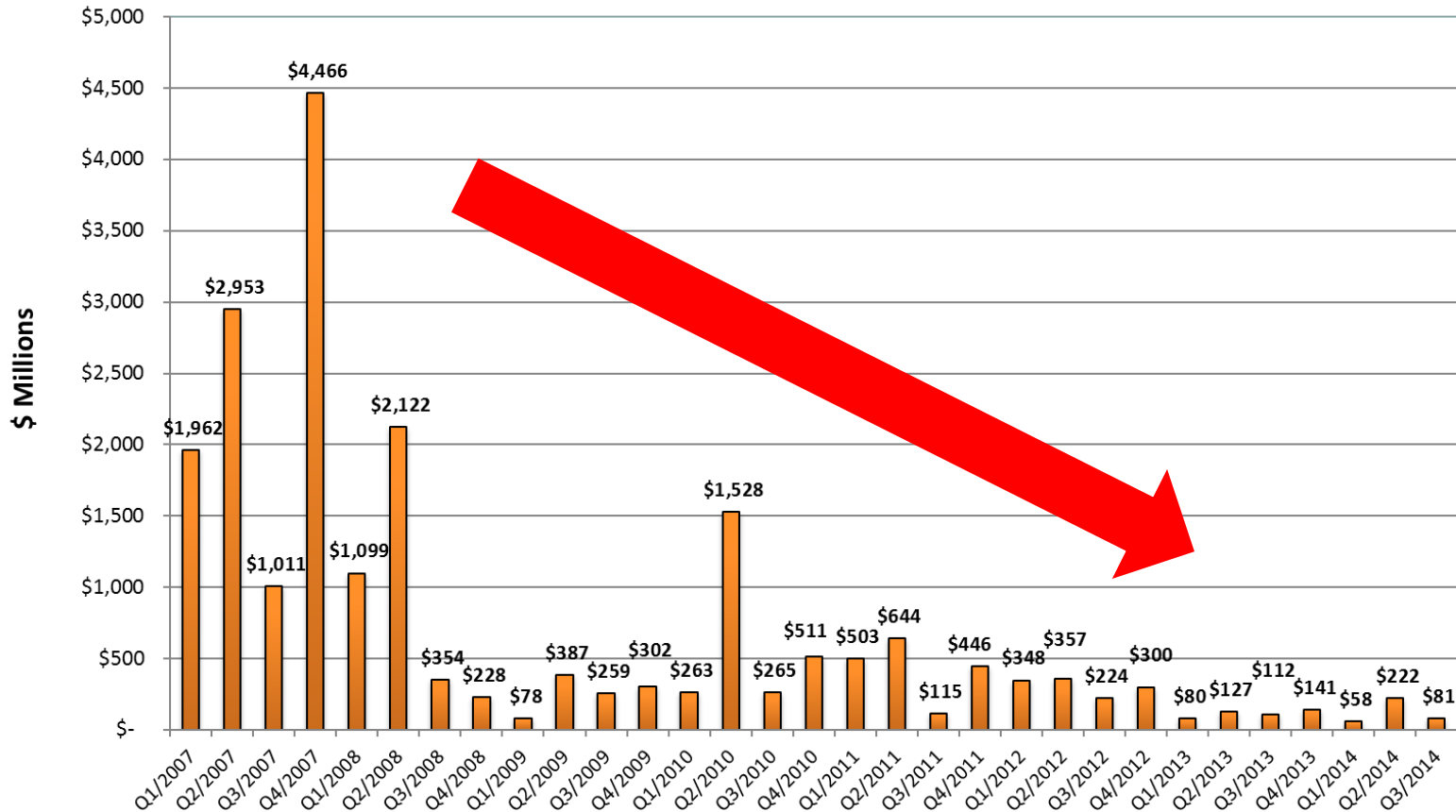


The “Chinese Hangover” – price challenges



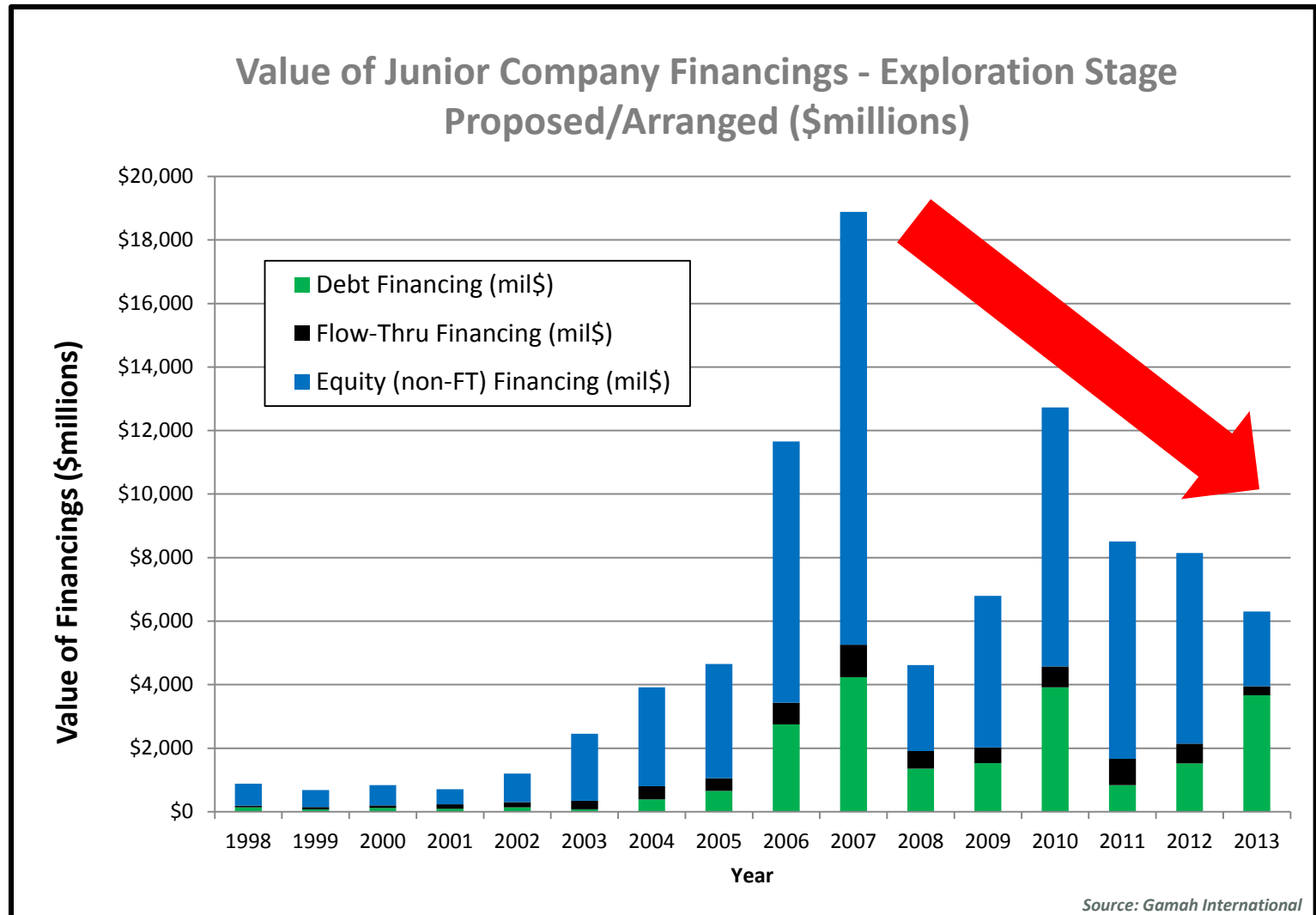
Exploration Financing Challenges – Global

Global Equity Financing for Exploration



Mineral Exploration Financing – All Exchanges. Source: GAMA International Ltd

Exploration Financing challenges, Canada too



All is not lost, though ...

One reality of the market place that we know



“This too shall pass!”

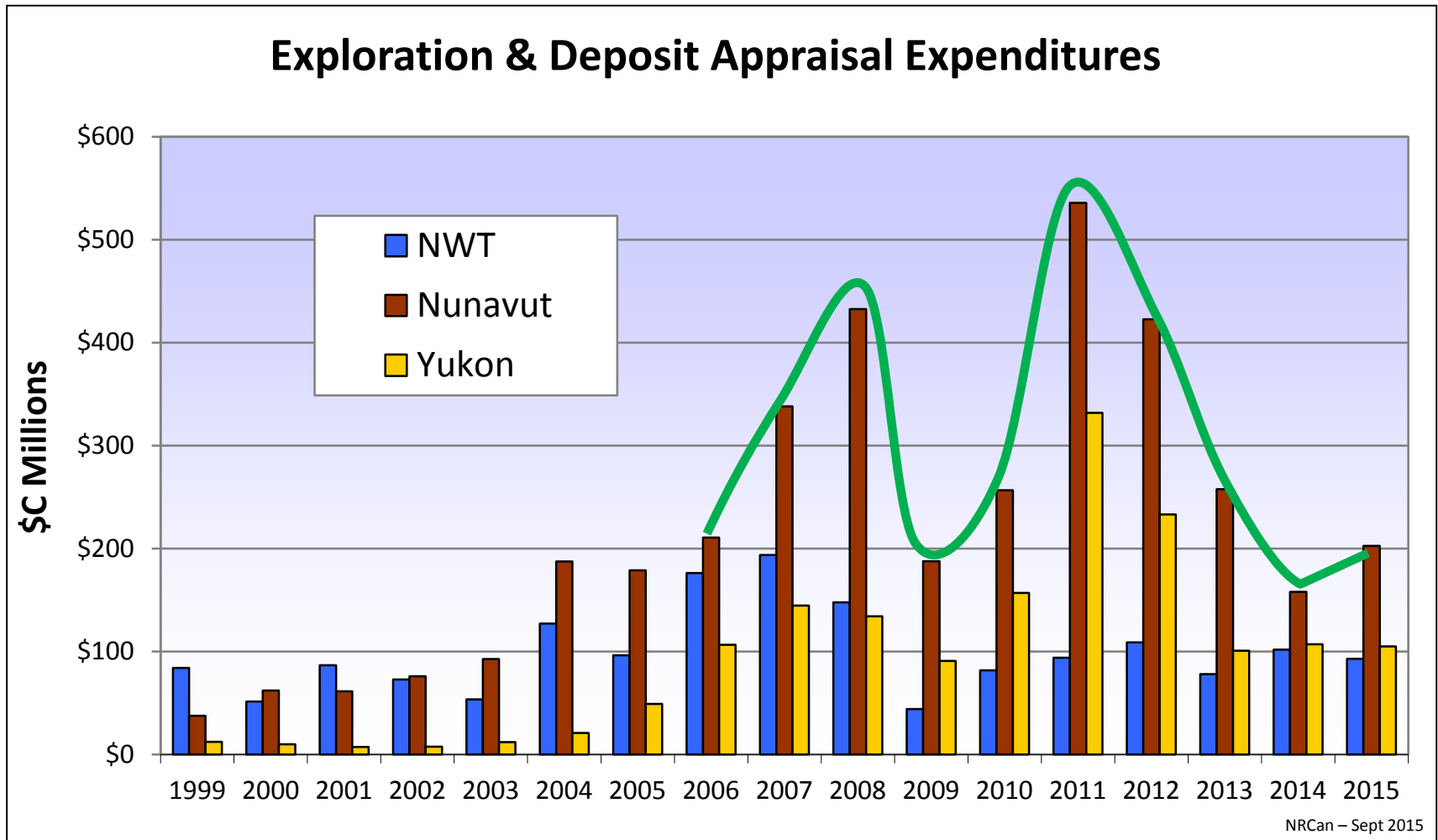
History tells us that the markets will improve again.

**We can't change the marketplace, but ...
we can change ourselves**



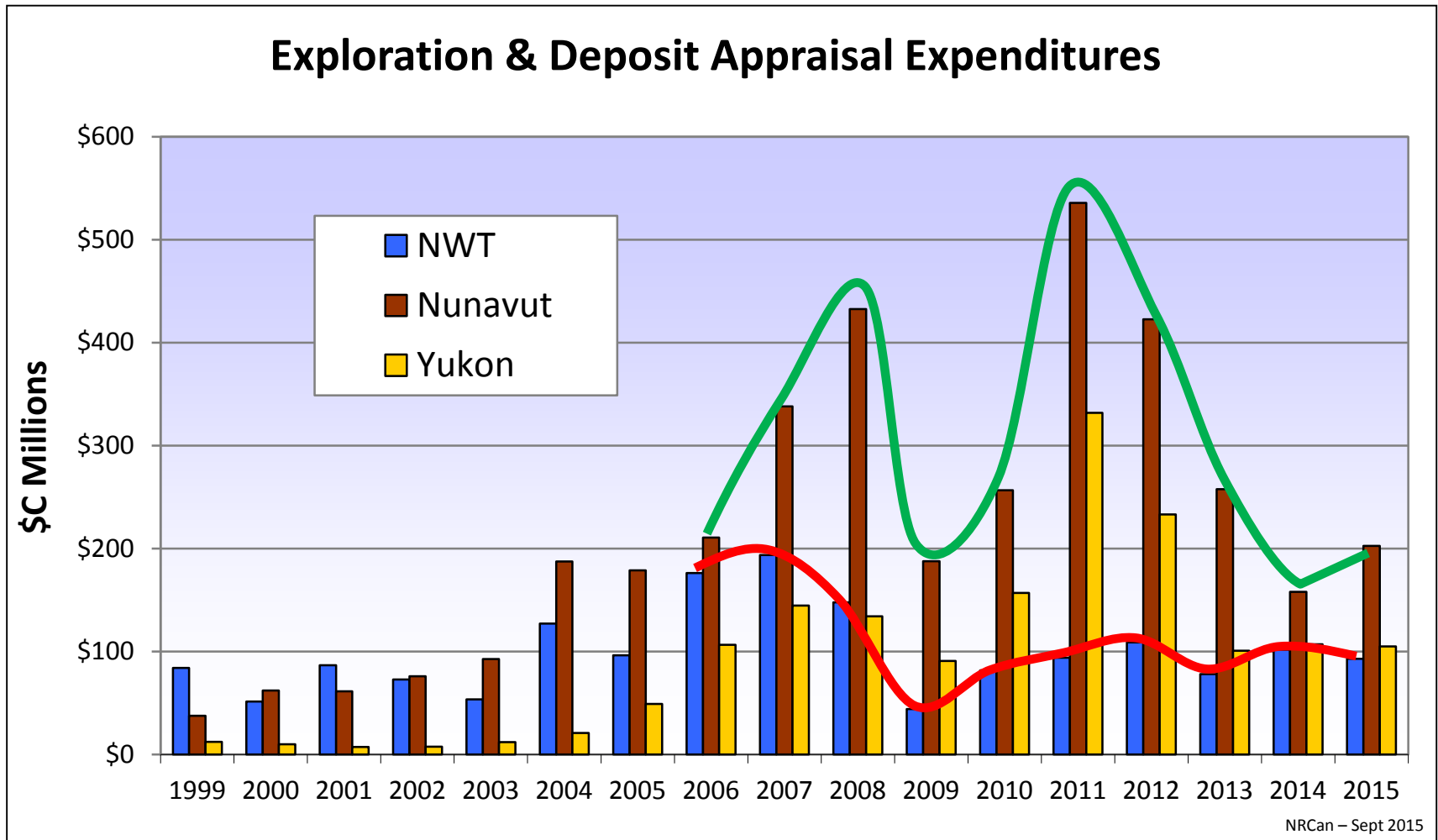
... take actions now to be ready for the market rise.

We have some control of our fate



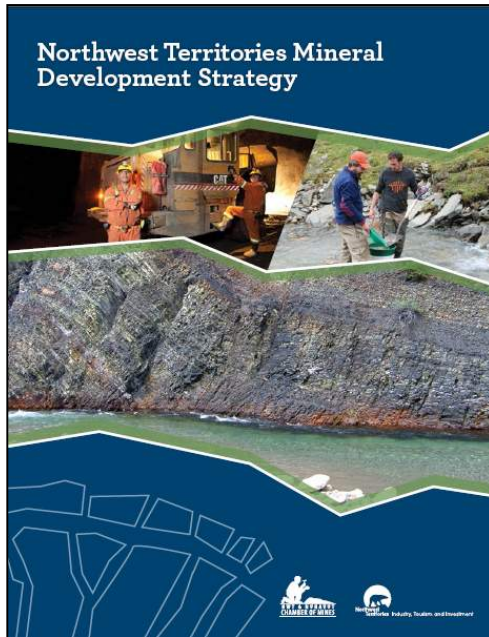
- Yukon and NU exploration investment followed the markets
- NWT Exploration spending was out of synch = means self-inflicted

We have some control of our fate

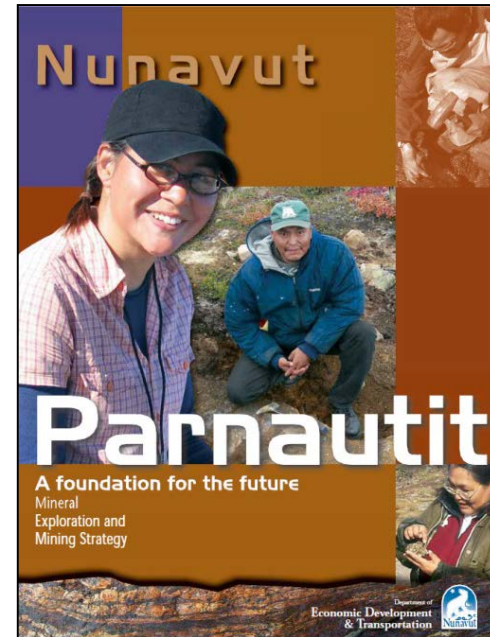


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Strategic action plans for mining



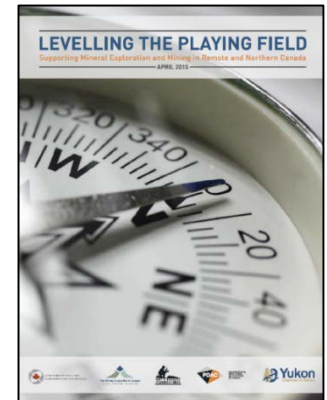
- ***NWT Mineral Strategy – 2013***
 - To prepare for devolution
 - Strengthen mining,
 - Rejuvenate exploration
 - Support northern jobs, business and taxes
- Some good actions to date, but ...
 - Government needs to do more



- ***NU Mineral Strategy – 2007***
 - To create conditions for a strong and sustainable minerals industry that contributes to quality of life for all
 - Economy will depend on development of resources
- Strategy needs rejuvenation
 - Devolution is coming ...

Taking action to enhance investment

- Invest in infrastructure – “Level the Playing Field”
- Increase certainty with regulatory improvement, eg:
 - Do not proceed with regulatory cost recovery in the North
 - Exempt small projects from EA – MVRMA hair trigger
- Address land access uncertainty
 - Settle remaining Aboriginal Land Claims
 - Advance land use planning
 - Reduce growing protected/conservation areas
- Reduce the high northern cost of living
- Create economic strategies that all departments support
- Educate to increase public support for mining and our economy
- Improve education outcomes and provide training
- Have Public & Aboriginal gov'ts join in marketing to investors

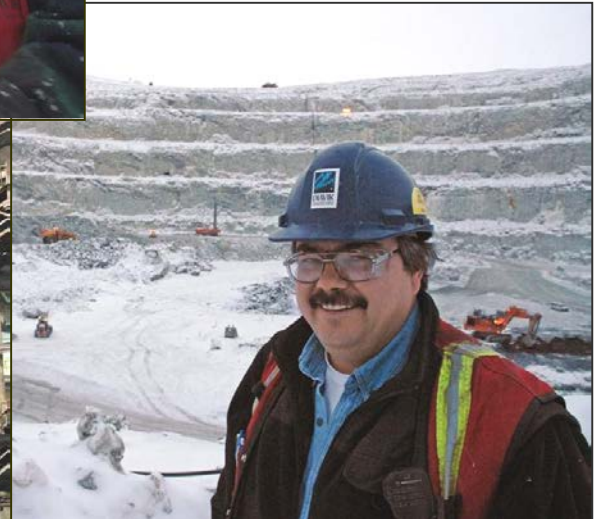
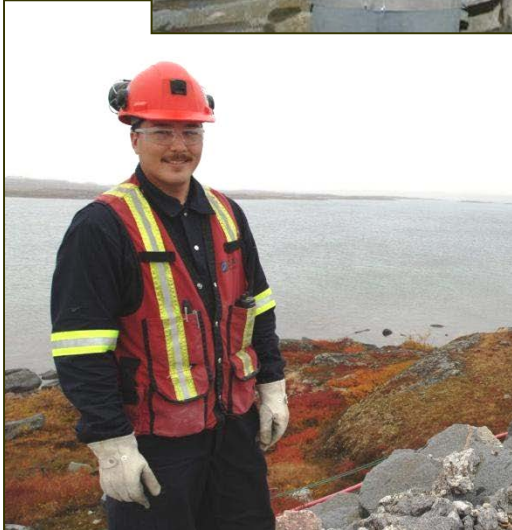
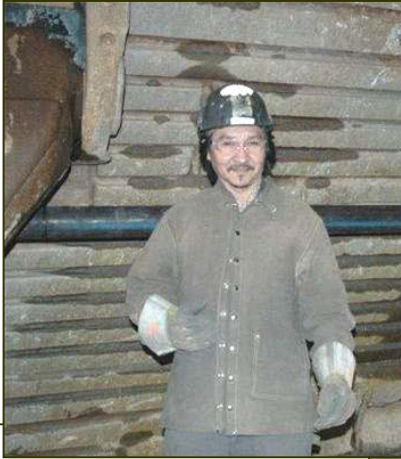


www.miningnorth.com

Conclusion

- Mining is proving its ability to create significant benefits for NWT and NU
- Exploration and mining are challenged by global and regional factors
- But there are actions we can take today to help our industry become even more beneficial and successful to our two Territories

Why it matters



Courtesy Diavik Diamond Mines Inc.