

MEMORANDUM

To: The Senate Committee on Economic Development, Housing and General Affairs, Vermont General Assembly

From: Prof. Oliver R. Goodenough, Vermont Law School Center for Legal Innovation

Re: Financial Technology Report

Date: February 27, 2017

Thank you for the opportunity to present testimony on S. 269. In my presentation today, I will seek to provide information that gives context to the proposed provisions in the most recent version of the Bill. Much of this information is available in third-party links and reports which the committee members can view by clicking through selectively as my presentation goes forward and later at their leisure. To summarize:

A. The Bill Revisions

1. The revised version of the Bill narrows the focus to four items:
 - Blockchain Based Limited Liability Companies
 - Personal Information Trust Companies
 - An insurance directed study
 - A FinTech/Blockchain summit

2. This narrowing of focus reflects feedback on the initial draft and the efforts of the Vermont Bar Association Section on Business Association.
 - The Government Departments requested fewer study committees
 - The Autonomous Agent Company proposal remains promising, but would benefit from further digesting
 - Can hear more about these revisions in future testimony

3. While treating fewer topics, a broadening of the scope of the two business organization forms to enable a wider range of blockchain related activities and a wider range of personal information coverage. Both of these are decided improvements.

- The full promise of blockchain is in applications beyond cryptocurrency
- The protection of personal information should extend beyond identity to all data relating to individuals

B. The Bill Rationale and Concerns

1. The two major initiatives are legal frameworks for blockchain/distributed ledger enterprises and for personal data companies that would owe a fiduciary duty to the individuals involved to hold and deploy the data for the benefit of those individuals. These two efforts complement each other.
2. The fiduciary approach to identity management can be an important element in empowering individuals in the age of big data, while simultaneously opening up business opportunities for Vermont
 - Remains a leadership possibility for Vermont
 - Hard to see negative public policy exposure
 - Will go hand in hand with blockchain: an important element in the architecture of protection
 - Encrypted information lodged in a distributed ledger can be both open and private
 - IBM: <https://www-01.ibm.com/common/ssi/cgi-bin/ssialias?htmlfid=GIL12346USEN&>
3. The promise of blockchain in finance goes much beyond the crop of current cryptocurrencies in the news.
 - Many of these first generation cryptocurrencies will be superseded by better versions
 - The proposed approach is to provide the opportunity for better governance, NOT relaxing consumer and investor protections
 - Department of Financial Regulation critical to keeping good protections
 - Original bill called for audit of current laws to look for updating and strengthening
 - Within finance, much happening beyond first generation cryptocurrency, with significant investment and recognition by very established players, including:
 - KPMG: <https://home.kpmg.com/xx/en/home/insights/2017/12/seize-the-full-potential-of-blockchain-in-3-steps-fs.html>
 - PwC: <https://www.pwc.com/us/en/industries/financial-services/fintech/blockchain.html>

- McKinsey: <https://www.mckinsey.com/industries/high-tech/our-insights/how-blockchains-could-change-the-world> ;
<https://www.mckinsey.com/industries/high-tech/our-insights/getting-serious-about-blockchain>
 - Bank of England: <https://www.bankofengland.co.uk/research/digital-currencies>
 - Citicorp and Goldman Sacks are critical of the current crop of cryptocurrencies, but simultaneously lead in blockchain investment for their own operations: it will play a significant role in the much of the financial system innovation in the coming decades.
 - <https://www.pymnts.com/news/b2b-payments/2017/blockchain-technology-citigroup-ups-vanguard/>
 - <https://cryptovest.com/news/ceo-says-citigroup-not-interested-in-bitcoin-very-interested-in-blockchain/>
 - <https://www.cbinsights.com/research/report/blockchain-trends-opportunities/>
4. The promise of blockchain generally goes well beyond finance, with many reputable and responsible players jumping into the conversation or putting substantial resources behind development.
- Generally
 - IBM: <https://www.ibm.com/blockchain/>
 - Economist Magazine <https://www.economist.com/news/world-if/21724906-trust-business-little-noticed-huge-startups-deploying-blockchain-technology-threaten>
 - IoT (Internet of Things) Applications
 - Business Insider <http://www.businessinsider.com/the-blockchain-in-the-iot-report-2017-6>
 - Supply Chain Applications:
 - IBM <https://www.ibm.com/blockchain/supply-chain/>
 - Forbes <https://www.forbes.com/sites/stevebanker/2018/02/22/the-growing-maturity-of-blockchain-for-supply-chain-management/#1dddd69811da>
 - Trade Finance:
 - Deloitte <https://www2.deloitte.com/content/dam/Deloitte/global/Documents/gri/d/trade-finance-placemat.pdf>

- American Express
<https://www.americanexpress.com/us/content/foreign-exchange/articles/blockchain-technology-to-streamline-trade-finance/>
 - Identity Management (again)
 - IBM <https://www-01.ibm.com/common/ssi/cgi-bin/ssialias?htmlfid=GIL12346USEN&>
 - E-Notary
 - Electronic Signature and Records Association (ESRA)
<https://esignrecords.org/esra-statement-policy-implications-blockchain-technology-electronic-signatures-records-laws/>
5. The proposed legislation would create opportunities for Vermont entrepreneurs and for attracting outside business to our State across this broad swath of activities.
- Economic development supported by being open to new developments
 - These areas show very high potential
 - Our proposals should encourage the maturation of these fields

Many thanks for the opportunity to share this information.