



Dow Chemical
VS.
E.I. du Pont de Nemours



The Consultants

Rich Cancro



Ali Choi



Thomas Gill



Jiehui Li



Chris Lin



Oksana Martova



Matt Trushell



Background

- founded in 1897 by Herbert Henry Dow (pictured)
- stock is publicly traded on the NYSE (DOW)
- headquarters is located in Midland, Michigan
- 3rd best chemical company in the world (2013)
- subsidiaries include Rohm & Haas



Inventions



Ziploc bags



Styrofoam



Saran wrap



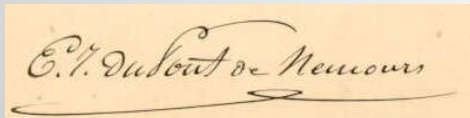
Scrubbing
Bubbles
Bathroom
Cleaner



Background



- founded in 1802 by [Éleuthère Irénée du Pont](#) (pictured)
- stock is publicly traded on the NYSE (DD)
- headquarters is located in Wilmington, Delaware
- 9th best chemical company in the world

A handwritten signature in cursive script, reading "E. I. du Pont de Nemours". The signature is written in dark ink on a light-colored background.

Inventions



Teflon



Tyvek



Lycra



Kevlar

Business Model

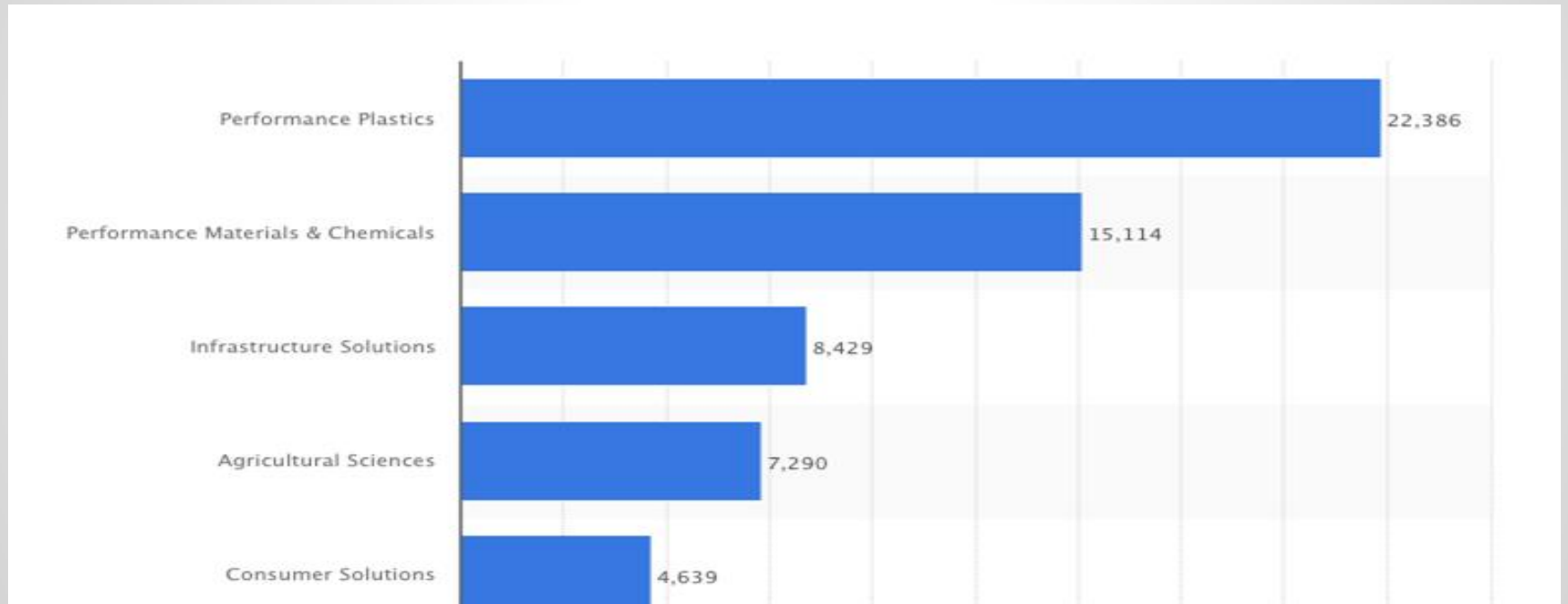
Dow

- Six business segments
- 1. Performance Plastics
- 2. Performance Materials
- 3. Feedstocks and Energy
- 4. Agricultural Sciences
- 5. Coatings and Infrastructure Solutions
- 6. Electronic and Functional Materials.

DuPont

- Eight business segments
- 1. Agriculture
- 2. Performance Chemicals
- 3. Performance Materials
- 4. Safety and Protection
- 5. Nutrition and Health
- 6. Electronics and Communications
- 7. Industrial Biosciences
- 8. Pharmaceuticals

Distribution of Dow Chemical's revenue in 2014 by segment



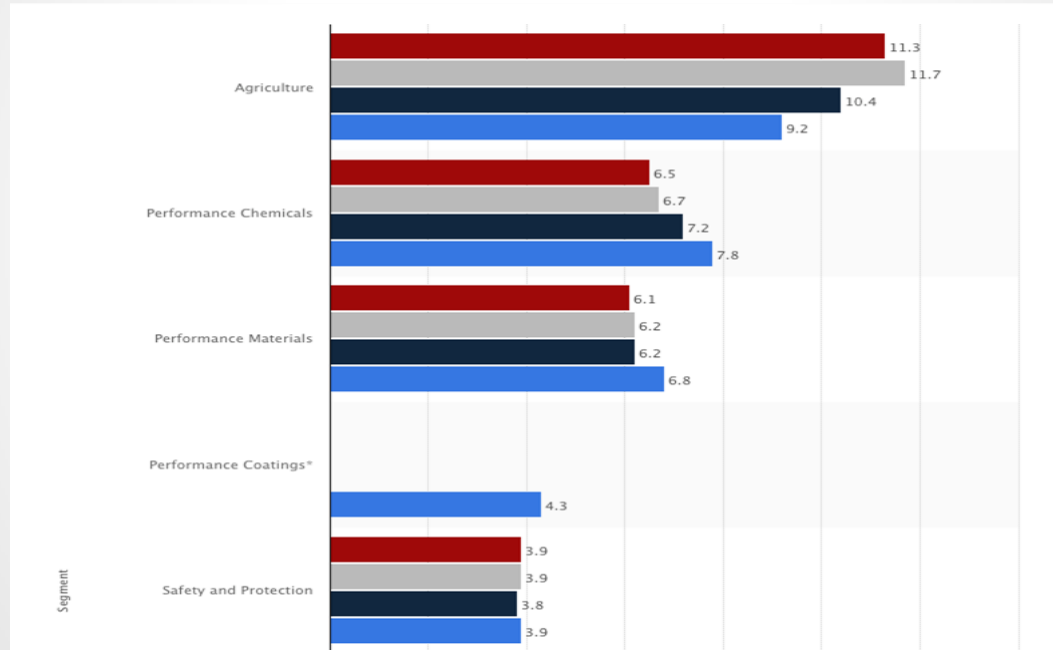
Revenue, Income, and Profit Margin by Segment (Dow)

Business Segments		(Dec. 30, 2014) Revenues (in millions \$)	IV. Quarter % (of total Revenues)	(Dec. 30, 2014) Income (in millions \$)	IV. Quarter % (Profit Margin)
Performance Plastics	→	5,465.00	37.99 %	1,194.00	21.85 %
Performance Chemicals	→	3,912.00	27.2 %	636.00	16.26 %
Agricultural Sciences	→	1,856.00	12.9 %	222.00	11.96 %
Other	→	68.00	0.47 %	0.00	-
Electronic & Specialty Materials	→	1,124.00	7.81 %	325.00	28.91 %
Coatings & Infrastructure	→	1,959.00	13.62 %	-104.00	-
Total	→	14,384.00	100 %	2,273.00	15.8 %

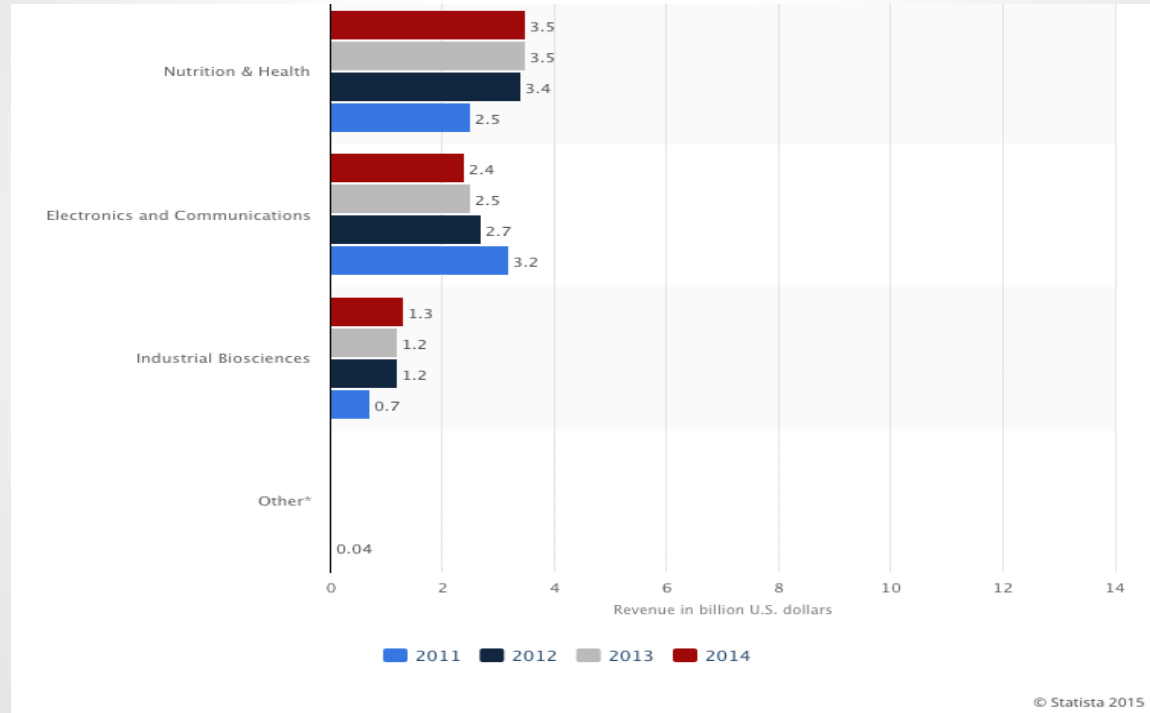
Growth rates of Revenue and Income by Segment (Dow)

Growth rates by Segment		(Dec. 30, 2014) Y/Y Revenue %	IV. Quarter Q/Q Revenue %	(Dec. 30, 2014) Y/Y Income %	IV. Quarter Q/Q Income %
Performance Plastics	→	41.76 %	39.27 %	-26.16 %	-6.35 %
Performance Chemicals	→	15.36 %	9.49 %	59.8 %	25.69 %
Agricultural Sciences	→	4.62 %	31.82 %	25.42 %	4340 %
Other	→	-4.23 %	-1.45 %	-	-
Electronic & Specialty Materials	→	-0.53 %	-6.26 %	43.81 %	1.56 %
Coatings & Infrastructure	→	12.72 %	6.12 %	-	-
Total	→	-0.01 %	-0.15 %	-17.91 %	-11.83 %

DuPont's revenues from 2011 to 2014 by Segment



Revenue by Segment (cont.)



Revenue, Income, and Profit Margin by Segment (DuPont)

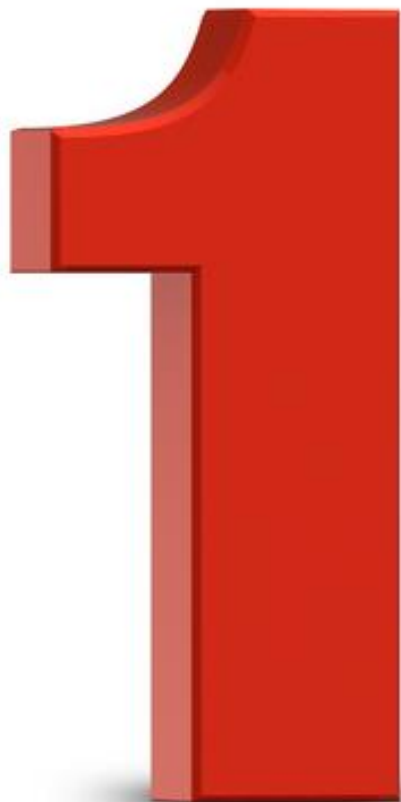
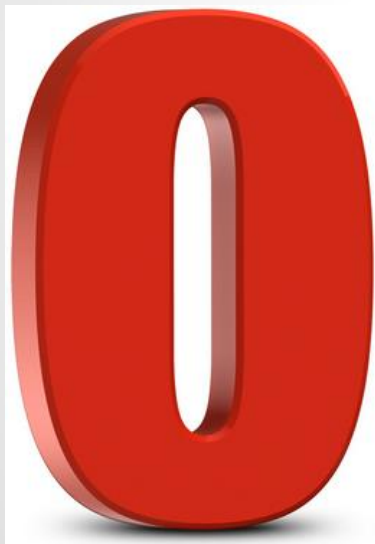
Business Segments		(March 31, 2015) Revenues (in millions \$)	I. Quarter % (of total Revenues)	(March 31, 2015) Income (in millions \$)	I. Quarter % (Profit Margin)
Agriculture	→	3,937.00	42.93 %	1,174.00	29.82 %
Coatings & Color Technologies	→	1,335.00	14.56 %	89.00	6.67 %
Electronic & Communication Technologies	→	517.00	5.64 %	2.00	0.39 %
Performance Materials	→	1,381.00	15.06 %	129.00	9.34 %
Safety & Protection	→	908.00	9.9 %	327.00	36.01 %
Nutrition & Health	→	813.00	8.86 %	129.00	15.87 %
Industrial Biosciences	→	280.00	3.05 %	85.00	30.36 %
Total	→	9,171.00	100 %	2,119.00	23.11 %

Growth rates of Revenue and Income by Segment (DuPont)

Growth rates by Segment		(March 31, 2015) Y/Y Revenue %	I. Quarter Q/Q Revenue %	(March 31, 2015) Y/Y Income %	I. Quarter Q/Q Income %
Agriculture	→	-10.4 %	127.31 %	-18.59 %	138.62 %
Coatings & Color Technologies	→	-12.86 %	-14.64 %	-55.5 %	-60.62 %
Electronic & Communication Technologies	→	-10.86 %	-9.77 %	-97.33 %	-97.53 %
Performance Materials	→	-13.31 %	-5.48 %	-56.86 %	-50.76 %
Safety & Protection	→	-4.12 %	-3.71 %	86.86 %	73.94 %
Nutrition & Health	→	-5.57 %	-3.56 %	38.71 %	72 %
Industrial Biosciences	→	-6.98 %	-13.04 %	51.79 %	123.68 %
Total	→	-10.17 %	23.28 %	-5.74 %	72.28 %

Who has the edge in the Business Model aspect?





Financial information

- 1. Performance and financial ratios
- 2. Earnings per share---BEPS and DEPS
- 3. Debt to equity ratio



VS





Performance and financial ratio

	Dow	DuPont
Revenue	56.08B	33.95B
Gross profit	10.70B	13.02B
Operating margin	10.34%	12.83%
Profit margin	7.49%	9.48%
Return on asset	5.29%	5.80%
Return on equity	16.73%	21.92%
Debt to equity ratio	1.97	1.80
Diluted EPS	3.28	3.50



1. Dow clearly has larger revenue. However, DuPont has larger gross profit.
2. DuPont has a higher profit margin as well as return on equity than Dow.
3. Both of the two companies have an acceptable debt to equity ratio.
4. DuPont had a higher DEPS last year.

If we consider their performance in the past ten years...

Dow

Financials												Export 	Ascending 
	2005-12	2006-12	2007-12	2008-12	2009-12	2010-12	2011-12	2012-12	2013-12	2014-12	TTM		
Revenue USD Mil	46,307	49,124	53,513	57,514	44,875	53,674	59,985	56,786	57,080	58,167	56,076		
Gross Margin %	17.3	15.5	13.3	9.6	12.8	14.7	14.9	15.8	16.6	18.4	19.3		
Operating Income USD Mil	5,244	4,130	3,237	953	480	2,947	3,995	2,384	4,276	5,467	5,621		
Operating Margin %	11.3	8.4	6.0	1.7	1.1	5.5	6.7	4.2	7.5	9.4	10.0		
Net Income USD Mil	4,515	3,724	2,887	579	648	2,310	2,742	1,182	4,787	3,772	4,201		
Earnings Per Share USD	4.62	3.82	2.99	0.62	0.32	1.72	2.05	0.70	3.68	2.87	3.23		
Dividends USD	1.34	1.50	1.64	1.68	0.60	0.60	0.90	1.21	1.28	1.53	1.58		
Payout Ratio %	29.3	36.9	54.7	272.5	272.7	34.9	32.5	169.1	58.3	47.7	49.0		
Shares Mil	977	974	966	939	1,054	1,144	1,158	1,176	1,290	1,187	1,197		
Book Value Per Share USD	15.16	17.53	20.62	14.63	14.39	15.28	17.01	14.03	16.60	18.77	15.82		
Operating Cash Flow USD Mil	4,474	4,154	4,484	4,711	2,075	4,102	3,879	4,075	7,823	6,502	7,185		
Cap Spending USD Mil	-1,597	-1,983	-2,105	-2,339	-2,123	-2,175	-2,830	-2,614	-2,302	-3,572	-3,803		
Free Cash Flow USD Mil	2,877	2,171	2,379	2,372	-48	1,927	1,049	1,461	5,521	2,930	3,382		
Free Cash Flow Per Share USD	3.21	2.02	2.46	2.53	-0.05	1.68	0.95	1.24	3.74	2.15	—		
Working Capital USD Mil	6,741	6,608	6,209	2,952	6,454	9,885	9,788	12,191	13,006	12,674	—		

DuPont

Financials												Export 	Ascending 
	2005-12	2006-12	2007-12	2008-12	2009-12	2010-12	2011-12	2012-12	2013-12	2014-12	TTM		
Revenue USD Mil	28,491	28,982	29,378	30,529	27,328	32,733	38,719	35,310	36,144	36,046	35,271		
Gross Margin %	30.9	29.5	26.6	21.1	27.9	29.3	28.2	27.5	37.6	39.8	39.7		
Operating Income USD Mil	4,001	3,789	2,898	1,460	2,184	3,711	4,282	4,072	3,937	5,368	5,148		
Operating Margin %	14.0	13.1	9.9	4.8	8.0	11.3	11.1	11.5	10.9	14.9	14.6		
Net Income USD Mil	2,053	3,148	2,988	2,007	1,755	3,031	3,474	2,788	4,848	3,625	3,217		
Earnings Per Share USD	2.07	3.38	3.22	2.20	1.92	3.28	3.68	2.95	5.18	3.92	3.49		
Dividends USD	1.46	1.48	1.52	1.64	1.64	1.64	1.64	1.70	1.78	1.84	1.86		
Payout Ratio %	66.3	57.1	47.2	74.5	84.9	49.9	44.5	65.1	61.4	54.2	53.5		
Shares Mil	987	928	925	907	909	922	941	942	933	922	918		
Book Value Per Share USD	12.82	10.72	12.12	7.63	7.72	9.86	12.21	10.56	14.68	17.33	13.88		
Operating Cash Flow USD Mil	2,542	3,736	4,290	3,129	4,741	4,559	5,152	4,849	3,179	3,712	4,010		
Cap Spending USD Mil	-1,340	-1,532	-1,585	-1,978	-1,308	-1,508	-1,843	-1,793	-1,882	-2,020	-2,265		
Free Cash Flow USD Mil	1,202	2,204	2,705	1,151	3,433	3,051	3,309	3,056	1,297	1,692	1,745		
Free Cash Flow Per Share USD	1.10	2.06	2.92	1.27	3.78	3.31	3.33	3.24	1.14	1.88	—		
Working Capital USD Mil	4,959	4,930	4,619	5,601	7,898	9,670	6,873	7,642	11,017	9,108	—		

Main Points

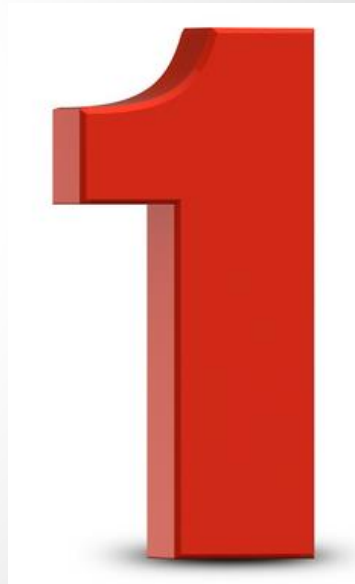
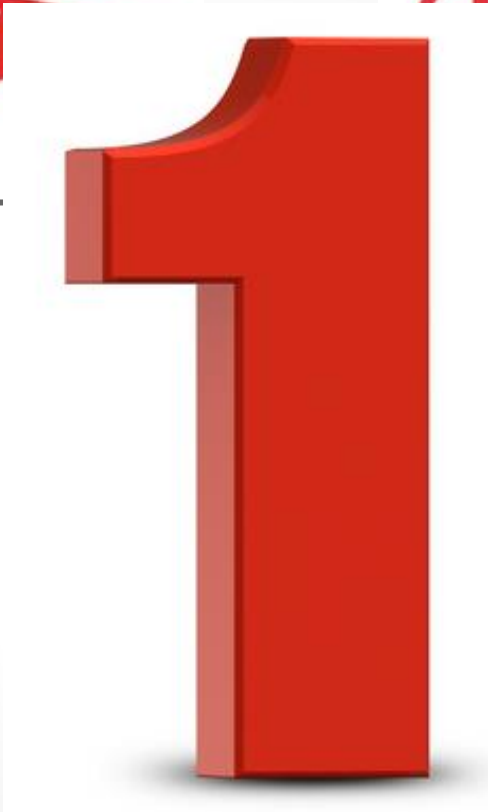
- 1. Basically, Dow and DuPont are both experiencing growth for the past ten years.
- 2. The 2008 economic crisis had a huge impact on both of the two companies. Dow and DuPont had their lowest net income, operating margin and earnings per share around 2008.
- 3. Both Dow and DuPont are recovering from the crisis.

Debt to equity ratio

- Dow has a debt to equity ratio of 1.97 and DuPont has a debt to equity ratio of 1.80 in 2014.
- Usually we say that a debt to equity ratio of 1.5 to 2 would be considered acceptable in the chemicals industry. In this case, both of them have acceptable debt to equity ratios.

Who has the edge in the Financial Analysis aspect?



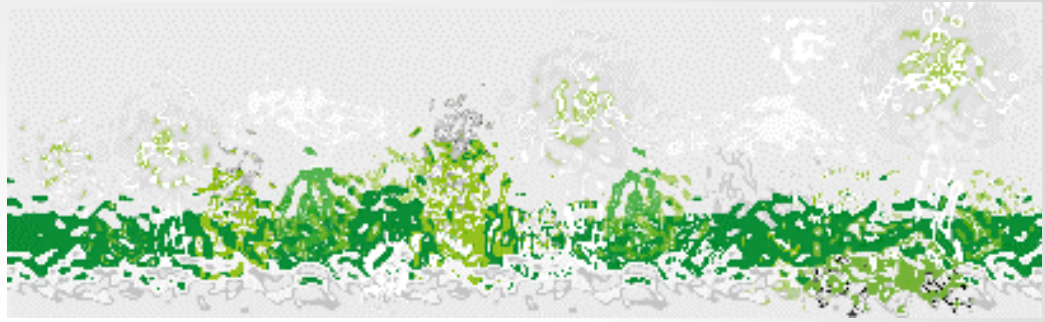
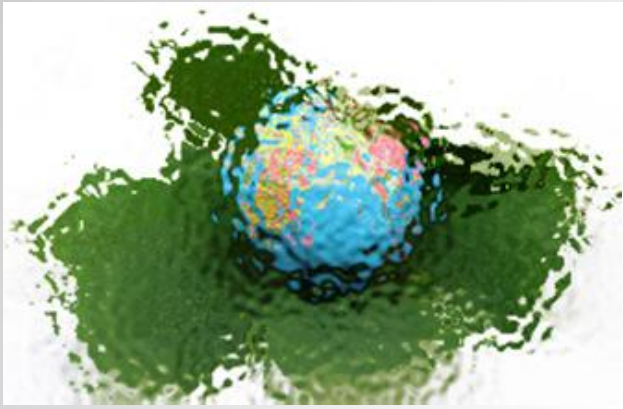


Earnings per share

- 1. DuPont did better in terms of BEPS and DEPS in 2014.
- 2. DuPont has a more stable earnings per share for the past three years, and Dow's earnings per share fluctuated greatly. However, Dow had higher BEPS and DEPS in 2013.

	Dow		DuPont	
	BEPS	DEPS	BEPS	DEPS
2012	0.71	0.70	2.61	2.59
2013	3.72	3.68	3.07	3.04
2014	2.91	2.87	3.94	3.90

Source: 10K and annual report



SUSTAINABILITY

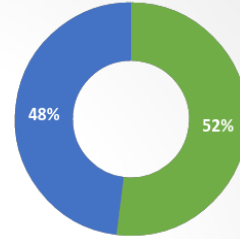
- Why is this area important for the industry?
- Why is this a relevant measure of companies' performance?



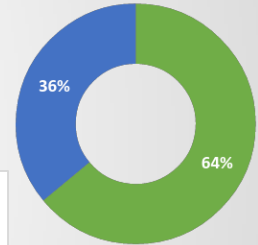
Industry History

- First environmental reports were published in the late 1980s by companies in the chemical industry which had serious image problems
- 1984 the massive chemical leak and subsequent contamination in Bhopal, India, are believed to have caused 20,000 deaths and left almost 600,000 people with permanent physical damage
- 2014 European Union moved to make sustainability reporting mandatory

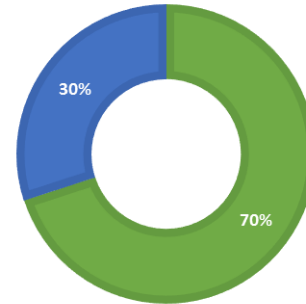
“What Investors and Analysts Said?”



Social and community information



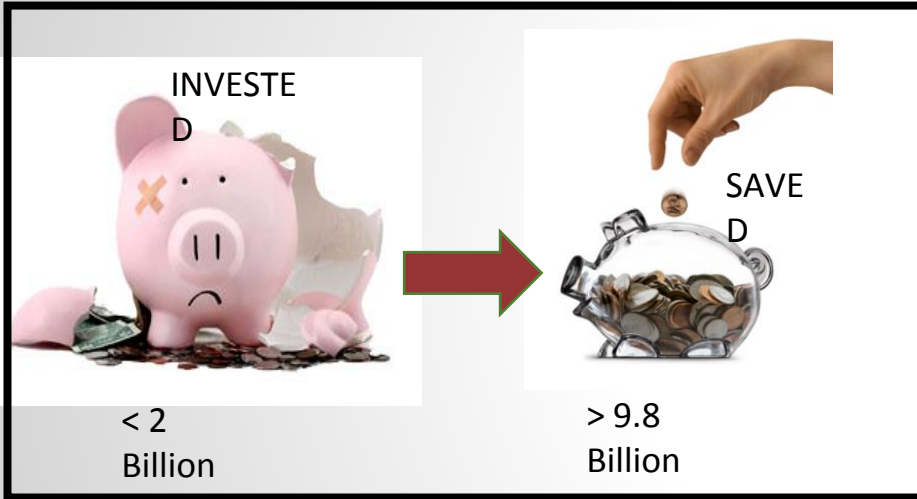
Information on natural resources



Governance information

DOW

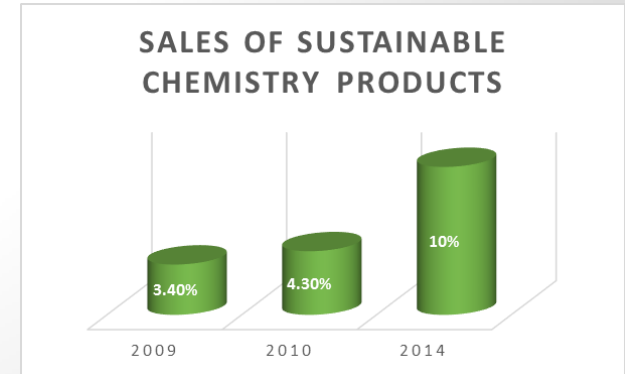
1994: established 10-year goals for environment, health, and safety.



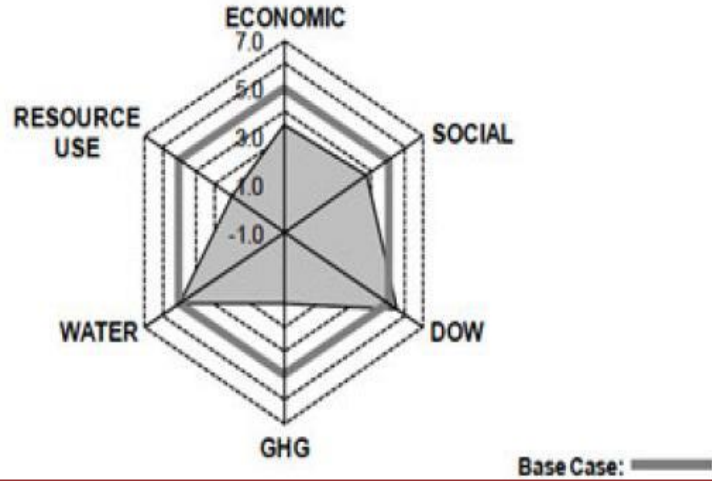
Sustainability as cost reduction

Sustainability as source of revenue

Sustainable Chemistry Index

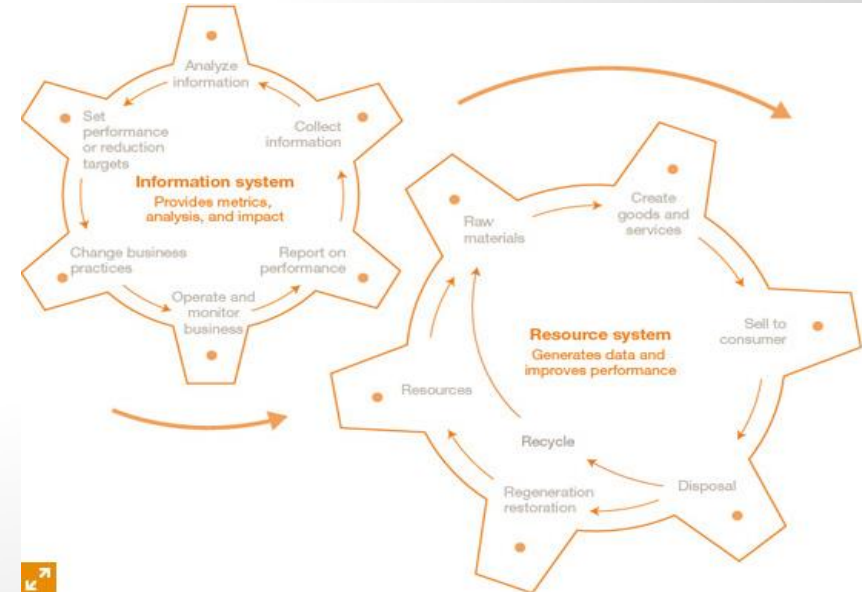


As the old adage goes, business cannot manage what they do not measure



Dow's Chemical Sustainability Footprint Tool

- A tool of risk estimation
- Evaluates the level of risk and company's willingness to take it



- A closed-loop system, which enables the sustainability maturity journey

DuPont

1 : 5

Revenue growth from products based on nondepletable resources

Revenue growth of company as a whole

- ✓ No formal internally developed metrics index
- ✓ No continuous lifecycle tracing of a product

Corporate Environmental Planning:

- 1) Establish key performance indicators fit
- 2) Establish focus areas for performance
- 3) identify environmental initiatives that align with business requirements and strategies
- 4) costs and benefits analysis
- 5) implementation of projects selected

“We used to live in a world where energy was cheap and information was expensive. Now, information is a resource that is becoming limitless, and energy and other environmental resources are becoming constrained”



XBRL for sustainability-oriented reporting:

GRI has created a taxonomy for XBRL that incorporates the GRI Sustainability Reporting Guidelines in 2012

Climate change taxonomy was released in 2014 to align environmental reporting models with those used for financial reporting and make data consistent with other sustainability frameworks, using XBRL such as the Global Reporting Initiative and the Dow Jones Sustainability Index.

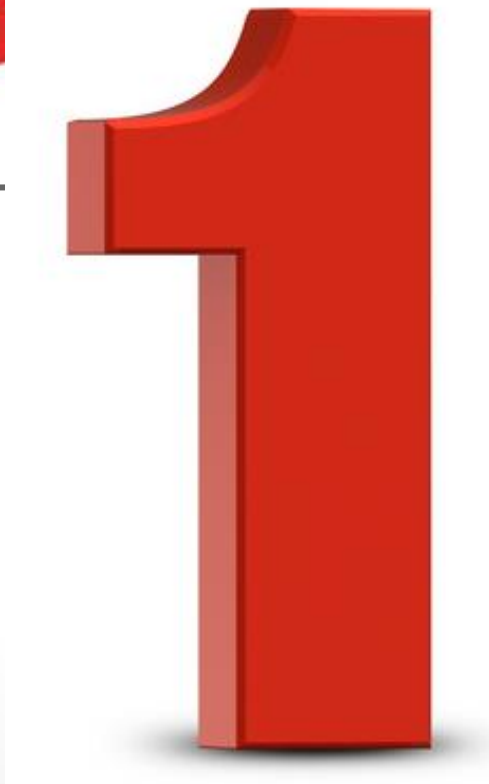
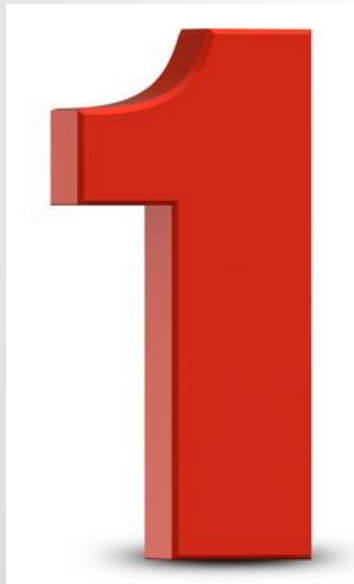
Who has the edge in the Sustainability aspect?



- ✓ DOW - recognized in the S&P 500 Clean Capitalism and Fortune
- ✓ DOW – recognized by Dow Jones Sustainability World Index in 2014 for the 14th time since the index is launched
- ✓ ICIS 2014 survey *(most extensive survey to date of the chemical industry on the topic of sustainability and use of alternative feedstock)* – DOW 2nd, DuPont 3rd.

- ✓ DuPont has been mentioned in North America Dow Jones Sustainability Index





Regulations

- SASB - guidelines for disclosing material sustainability information
- Common disclosure topics:
 - Greenhouse emissions
 - Hazardous materials management
 - Employee health and safety
- Each company decides what is material to them

Regulation S-K

- Known trends or uncertainties with a material impact on sales or operations
- Item 101(c)(1)(xii) - costs of complying with environmental laws
- Item 103 - legal proceedings
- Item 503(c) - risk factors

Accounting Policies

- Liabilities related to litigation matters
 - Accrued when it is probable that liability has been incurred and can be reasonably estimated
- Legal costs
 - Expensed in the period in which they occur
- Environmental costs
 - Remediation and restoration costs are expensed
 - Costs which increase the value of the property or prevent future contamination are capitalized

Risk Factors

- Environmental Compliance
- Costs of compliance can have a negative impact
- Regulations change rapidly



Risk Factors (cont'd)

Dow

- \$700 million accrued obligations for environmental and remediation costs
- Actual costs can be higher



DuPont

- Also liable for environmental and remediation costs
- Estimates are likely to change

Legal Proceedings - Dow

- Union Carbide

- Asbestos lawsuits

- Dow Benelux

- Foreign subsidiary fined Euro 1.8 million
- Safety incidents and environmental spills

Legal Proceedings - DuPont

- Imprelis
 - \$1.175 billion in total charges
 - \$261 million in accruals
 - \$210 million of insurance income
 - \$35 million of insurance receivables

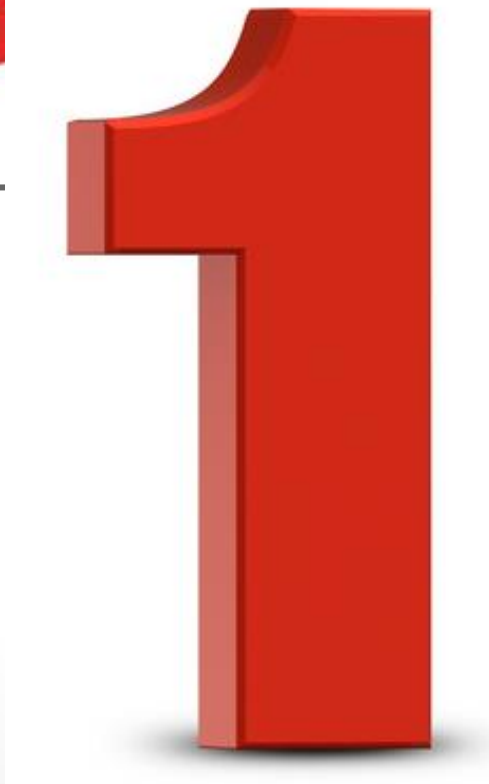


DuPont Legal Proceedings (cont'd)

- PFOA (perfluorooctanoic acids)
 - \$14 million of accruals
 - More lawsuits expected
- 2014 gas leak
 - \$99,000
 - OSHA claims incident could have been prevented

Who has the edge???

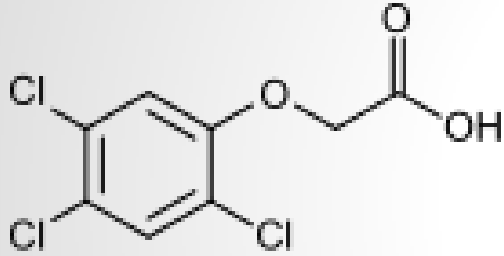




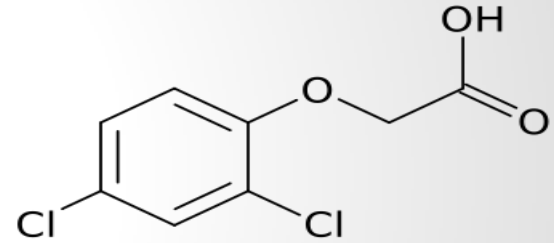
Agent Orange



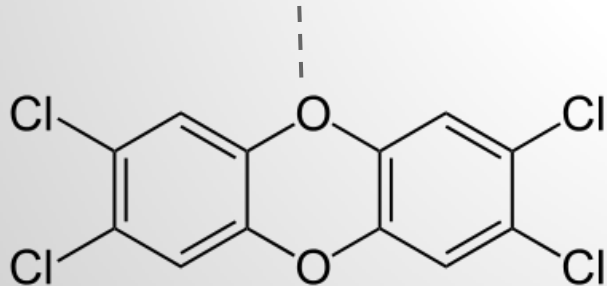
Agent Orange



2,4,5-T



2,4-D



TCDD

Agent Orange



Major TỰ ĐỨC PHẠNG

woman with chloracne



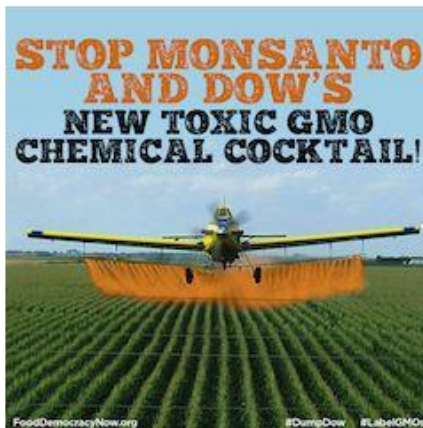
Agent Orange



Agent Orange

"We are sympathetic with people who believe they have been injured and understand their concern to find the cause, but reliable scientific evidence indicates that Agent Orange is not the cause of serious long-term health effects."

- **Jill Montgomery**, Monsanto spokesman, 2004



Keep Toxic New Agent Orange GMOs off Your Plate!

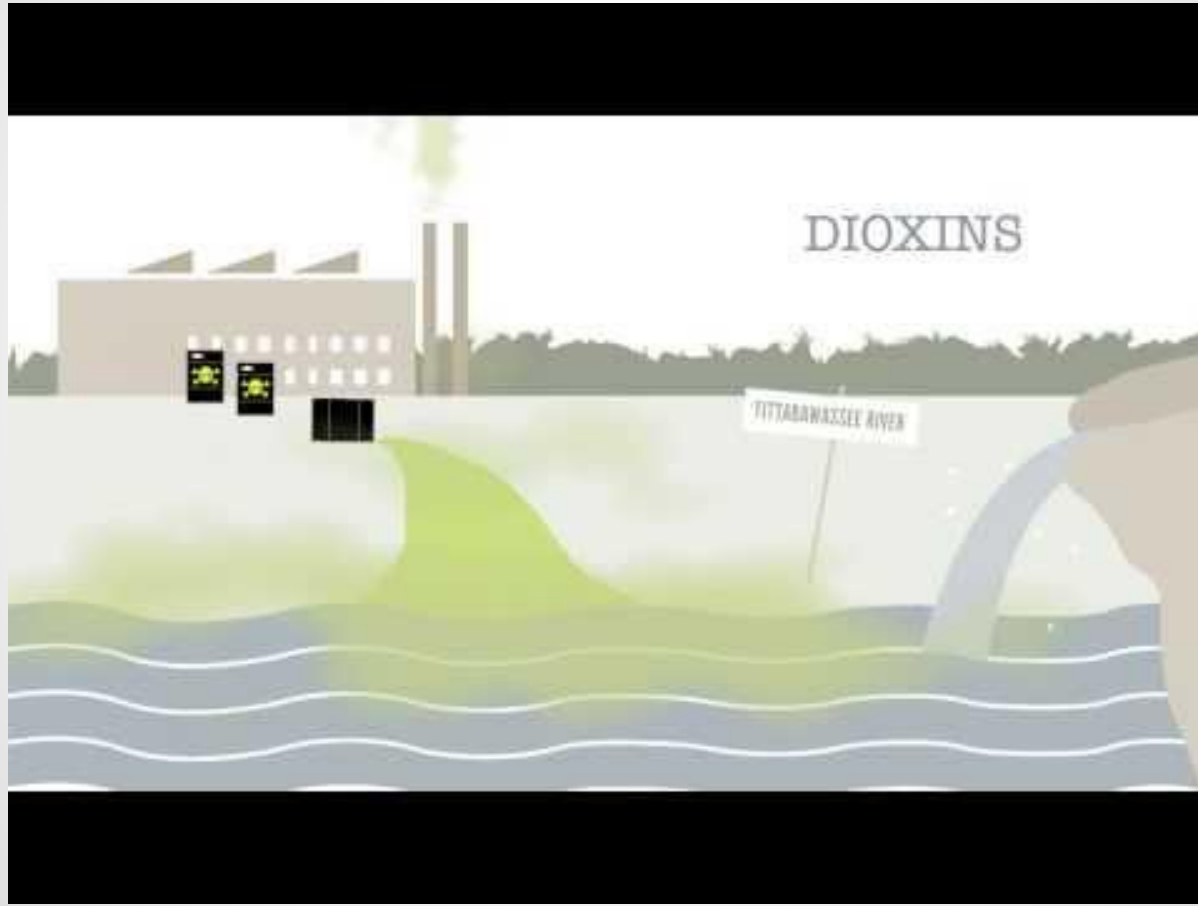
The first generation of biotech crops has failed. And failed badly. Now the biotech industry is stepping up the chemical arms race in an effort to make up for the failure of Monsanto's Roundup. Excessive use of Roundup by GMO farmers has led million of acres of U.S. farmland filled with Roundup resistant superweeds.

To combat this, Dow Chemical is petitioning the EPA and USDA to approve a new Enlist GMO "Agent Orange" corn and soy to tolerate 2,4-D, a main chemical component of the Vietnam era defoliant linked to birth defects, cancer, and hormone disruption, and glyphosate, the main chemical in Monsanto's best selling weedkiller Roundup. On top of these horrific health problems, 2,4-D is widely known among farmers to be difficult to control during application, leading to drift onto neighboring farms, causing major crop damage and contaminating waterways.

These facts have greatly alarmed scientists and farmers alike, leading a former top Reagan USDA official to declare 2,4-D one of "the most dangerous chemicals out there."

Tell the EPA to Dump Dow's Dangerous New Enlist Agent Orange GMOs!

Agent Orange



Secret Science Reform Act of 2015

- would bar the EPA from issuing certain rules unless all relevant research is named and publicly available for those who want it
- bill contains provisions that would block enforcement of clean air and water regulations, limitations of hydraulic fracturing, or fracking, and limitations of mining natural gas on federal land



American Fuel and Petrochemical Manufacturers

- fully support the Secret Science Reform Act
- DuPont is a member of the AFPM



AFPM

Who has the edge?





2

1

2

Corporate Governance

Shareholder Value & Dupont's Proxy Battle



Dupont's Proxy Battle

Triun Partners
Nelson Peltz

“Years of steady cash flow tend to dull companies’ entrepreneurial fire and focus on having best-in-class profit margins and revenue growth. Top-heavy corporate structures result, characterized by layer upon layer of bureaucracy anxious to justify their very existence. Accountability erodes as key decisions, such as where to spend research-and-development, capital expansion, marketing, and advertising dollars, devolve more and more from operating units to headquarters. Special constituencies and interest groups develop to subvert any attempt at zero-based, or what we at Triun call white-sheet, budgeting, in which every expense has to be justified as enhancing profitability and growth.”

Dupont's Proxy Battle

Why Dupont?

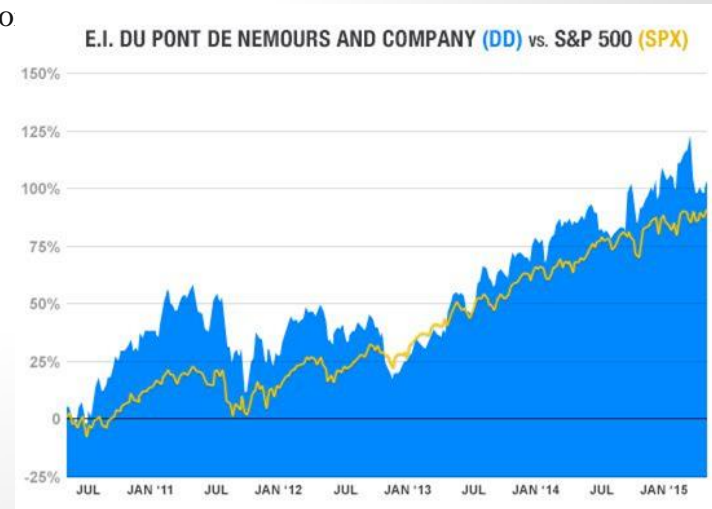
Triun saw Dupont as a target:

- Underperformance relative to peers
- Complex business structure saddled with excess costs and bureaucracy
- Missed sales & earnings targets
- Posted sales & margins that underperformed competitors
- Critical of Dupont's board's method of calculating bonuses..saw bonuses out of line with company performance

Dupont's Proxy Battle

Why not Dupont?

- Dupont's operating margins rise from 9.5% in 2008 to 16.5% in 2014
- For the 6 years ending in 2014, DuPont had a total return for S&P 500 chemical company and 159% for S&P 500 index



DuPont's Proxy Battle

Battle timeline

Privately:

- **DuPont sells coating division for 5 billion**
- **Mid 2013 Trian's investment in DD reported. 2.68% worth \$1.8 B**
- **July 2013. DD CEO & CFO meet w Trian's CIO & Matthew Peltz. CEO learns of Trian plan to break up DD into 4 parts. CEO gives Trian's proposal to BOD**
- **DD CEO hires Investment banks Goldman Sachs & Evercore among others (law & PR firms) to help with fight**
- **September 2013. On behalf of DD, investment banks tell Trian that their cost-saving numbers don't add up**
- **Oct 2013 Trian tells Kullman DD has 3 choices:**
 - 1. Break up DD**
 - 2. Put Trian CIO and Trian approved exec on DD BOD**
 - 3. Face Proxy fight**

Publicly:

- **DD cancels meeting w Trian, rejects break up proposal & refuses Trian BOD addition**
- **Major DD investor calSTRS asks DD to find a common ground with Trian**
- **DD CEO and Trian meet. New proposal, break DD into 3 parts. Trian states Carlyle group was able to cut 100's of millions in costs from previously sold coatings division**
- **February 2014 Fidelity asks Trian to try to settle a deal with DD**
- **2014 deadline passes for Trian to file proxy nomination**
- **September 2014 – Trian goes public with break-up plan for DD. Kullman sells 35% of her DD stock**
- **October 2014 Kullman and Peltz have lunch together in NYC restaurant**
- **Fall 2014 Gallogly, CEO of chemical co LyondellBassell begins receiving recruitment calls from Peltz to join DD BOD. Says no repeatedly over time**
- **December 2014 – DD announces effort to sell Hotel DuPont. The hotel and golf course had been pointed out by Peltz as corporate excess. DuPont claims sale is part of Chemours spin-off**

- **Jan 2015 DD signs of on potential deal to add Gallogly and Breen (Tyco exec) to DD BOD**
- **News of Kullman's stock sales published by WSJ**
- **Feb 2015 DD tells Peltz DD is willing to add Peltz candidate Gallogly and another to BOD is Peltz calls off proxy battle. Peltz refuses based on his not being offered BOD seat**
- **2 days later Kullman announces new DD BOD members**
- **March 2015 Moody's downgrades DuPont's credit rating, fearing Peltz would force DuPont to take on more debt**
- **Triun files for Proxy vote**
- **Both Kullman and Peltz meet investors (campaigning)**
- **April 2015 ISS (Institutional Shareholder Services) advise DD shareholders to elect Peltz to BOD. DD rises 5%**
- **May 13 2015 Triun loses proxy contest, DD stock drops 7%, yet to recover**

DuPont's Proxy Battle

Results

Trian loses by close margin

If one of four major index fund investors had voted for Trian, Peltz would have won

University of Chicago economics professor speculates that because index fund also held investments in DuPont competitor Monsanto, Peltz election to Dupont would have driven down value of fund

DuPont's Proxy Battle

Conclusion

- Overall, lines were drawn, sides were distinct
- Both sides said they were acting in interest of shareholders, but painted different pictures
- Activists can be good for ailing companies
- Activism tends to focus on ST financial goals resulting in increased share prices
- DuPont R&D would have been cut. Much innovation occurs at intersection of DuPont's many businesses

Shareholder value

???

- **Is it more important to increase shareholder value over the LT or ST?**
- In 1932, Adolf A. Berle and Gardiner C. Means publish [*The Modern Corporation and Private Property*](#) , saying owners (Rockefellers, Mellons, Carnegies, and Morgans) ought to turn companies over to professional managers.
- In 1976, Michael C. Jensen and William H. Meckling published “Theory of the Firm: Managerial Behavior, Agency Costs and Ownership Structure” in the [*Journal of Financial Economics*](#), “maximizing shareholder value” became the new corporate mantra.
- Can’t optimize customer satisfaction and shareholder value simultaneously
- This led to executives influencing earnings expectations. The positive results, be they via Goodwill, intangible assets (prior to FASB 142, Goodwill had to be written down over time on a fixed amortization schedule), are not sustainable. They are cyclical. Re Jack Welch or Roberto Goizueta
- Drive customer satisfaction value a la Johnson & Johnson
- Temptation is to drive long-term gains in operations driven value away for temporary gains in expectations driven value

Who has the edge?





3

1

3

Analytics Background

Dow

- Released report
- Tone at the top



DuPont

- Restructuring
- Spin off



What to look for

Dow

- C-level expenses
- “Consulting fees”



DuPont

- Lump expenses
- Liability dumping



Analytics Studio®

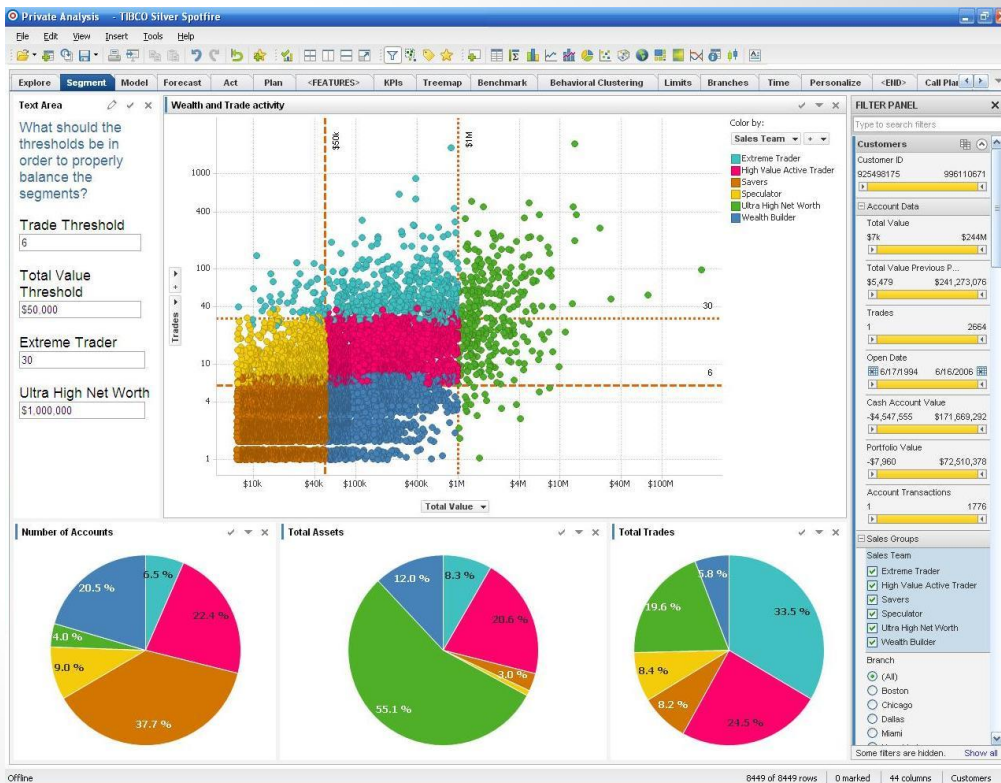
- What is R Studio?
- How to use?
 - Total accounts in error
 - Total errors in account
- Flexibility

```
> grd=seq(0.0001,0.15,length=11)
> smp=c(2,1,0)
> n=c(75,50,25)
> N=c(5000,3000,2000)
> as.numeric(quantile(simulateT(smp,n,N,grd,40000),0.95))
[1] 421
> ## out of 40000 accounts, 421 were found to have errors ##
```

```
> y=rgamma(500,5)
> x=y
> dum=sample(1:500,50)
> x[dum]=x[dum]*runif(50,.05,0.5)
> smp=sample(1:500,40)
> quantile(simulated(y[smp],x[smp],y[-smp],40,1,1,1000),0.95)
95%
350.6639
> ## out of 1000 sampled transactions, ~350 came back with errors ##
```

Analytics Spotfire®

- Use in tandem with R Studio
- Using the data

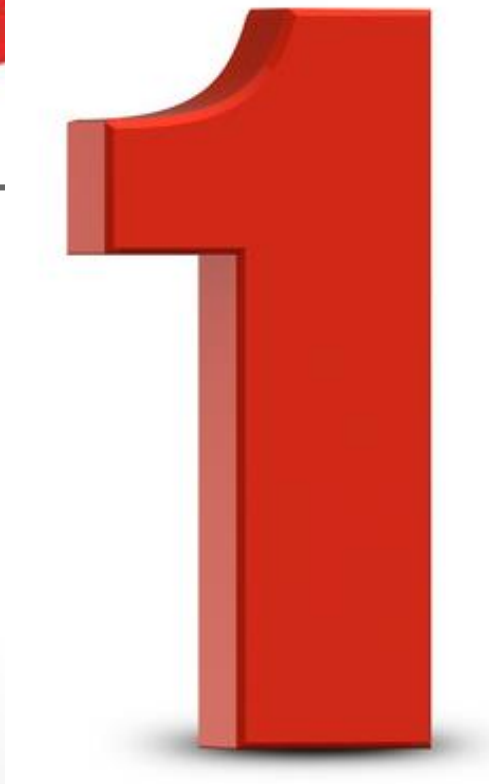


Who has the edge?

Given the background of both companies and the resources available to us, it would make the most sense for us to choose DuPont for Analytics for two reasons:

- Depth of potential fraud
- Relevance of software





Our client is...



Sources

Accounting for Sustainability Community “Investors and analysts use extra-financial information in decision-making, suggests new research” Web. July 25

“Agent Orange.” *Wikipedia*. Wikimedia Foundation, n.d. Web. 05 Aug. 2015.
<https://en.wikipedia.org/wiki/Agent_Orange>.

Arguello, Martha. “Re: 1. Docket EPA–HQ–OPP–2011–0835 (corn) 2. Docket EPA–HQ–OPP–2012–0306 (soybeans).” Letter to Mr. Walsh. 22 June 2012. Center for Food Safety, n.d. Web. 3 Aug. 2015.
<http://www.centerforfoodsafety.org/files/epa-24d-letter-from-70-health-scientists-2012june22_71807.pdf>.

Berger, Judson. “EPA ‘secret Science’ under the Microscope as GOP Lawmakers Seek Ban.” *Fox News*. FOX News Network, 20 July 2015. Web. 05 Aug. 2015.
<<http://www.foxnews.com/politics/2015/07/20/gop-lawmakers-aim-to-end-epas-use-secret-science/>>

Bristow, Rosie for the Guardian Professional Network. “Online discussion: sustainability reporting | Guardian Sustainable Business”. *Theguardian.com*. Retrieved 2014-08-27.

C&EN’s Global Top 50 Chemical Firms For 2014.” *Chemical & Engineering News*, 28 July 2014. Web. 29 June 2015.
<<http://cen.acs.org/articles/92/i30/CENs-Global-Top-50-Chemical.html>>.

Cama, Timothy. “DuPont to Pay \$1.3 Million for W.Va. Chemical Spills.” *TheHill*. N.p., 28 Aug. 2014. Web.
<<http://thehill.com/policy/energy-environment/216162-dupont-to-pay-13-million-for-wva-chemical-spills>>.

Chemicals: Sustainability Accounting Standard. N.p.: SASB, Oct. 2014. PDF.
<http://www.sasb.org/wp-content/uploads/2014/10/RT0101_Chemicals_2014-10-08_PubComm.pdf>

“DD Key Statistics | Du Pont (E.I.) De Nemours & Co Stock - Yahoo! Finance.” *DD Key Statistics | Du Pont (E.I.) De Nemours & Co Stock - Yahoo! Finance*. N.p., n.d. Web. 05 Aug. 2015. <<http://finance.yahoo.com/q/ks?s=DD%2BKey%2BStatistics>>.

De La Merced, Michael J., and Andrew Ross Sorkin. “DuPont Finds Itself a Target of Activist Nelson Peltz.” *New York Times*. N.p., 08 Jan. 2015. Web.
<<http://dealbook.nytimes.com/2015/01/08/nelson-peltz-to-start-proxy-battle-at-dupont/>>.

DeGarmo, Tom “Sustainability: Moving from compliance to leadership” Web. April 2015

Diamond, Marie. “Dow Chemical Will Pay Just \$2.5 Million In Fines For Years Of Environmental Violations.” *ThinkProgress RSS*. N.p., 03 Aug. 2011. Web.
<<http://thinkprogress.org/justice/2011/08/03/286409/dow-chemical-will-pay-just-2-5-million-in-fines-for-years-of-environmental-violations/>>.

“Dioxins.” *Dioxin*. N.p., n.d. Web. 05 Aug. 2015.
<<http://www.idph.state.il.us/envhealth/factsheets/dioxin.htm>>.

“Dow Chemical Co.” *Growth, Profitability, and Financial Ratios for (DOW) from Morningstar.com*. N.p., n.d. Web. 05 Aug. 2015.
<<http://financials.morningstar.com/ratios/r.html?t=DOW>>.

The Dow Chemical Company. “Form 10-K For the Fiscal Year Ended DECEMBER 31, 2012.” SEC, n.d. Web.
<<https://www.sec.gov/Archives/edgar/data/29915/000002991513000014/dow201210k.htm>>.

The Dow Chemical Company. “Form 10-K For the Fiscal Year Ended DECEMBER 31, 2013.” SEC, n.d. Web.
<<https://www.sec.gov/Archives/edgar/data/29915/000002991514000011/dow201310k.htm>>.

The Dow Chemical Company. “Form 10-K For the Fiscal Year Ended DECEMBER 31, 2014.” SEC, n.d. Web.
<<https://www.sec.gov/Archives/edgar/data/29915/000002991515000011/dow201410k.htm>>.

DOW CHEMICAL COMPANY Segments.” *Dow Chemical (DOW) Divisions, Quarterly Segment Results*. Web. <<http://csimarket.com/stocks/segments.php?code=DOW>>.

The Dow Chemical Company: SWOT Analysis. Rep. no. A7952256-2167-4119-B3FD-A907D86D1693. Marketline, May 2015. Web.

Dow Chemical’s Segment Revenue 2014 | Statista.” *Statista*. Web.
<<http://www.statista.com/statistics/267397/dow-chemicals-revenue-by-segment/>>.

“DOW Key Statistics | Dow Chemical Co. Stock - Yahoo! Finance.” *DOW Key Statistics | Dow Chemical Co. Stock - Yahoo! Finance*. N.p., n.d. Web. 05 Aug. 2015.
<<http://finance.yahoo.com/q/ks?s=DOW%2BKey%2BStatistics>>.