

Timelines

Barg, Julian
`jbarg.phd@ivey.ca`

March 30, 2021

Maguire and Hardy (2009)

Table 1: DDT events

1874	•	DDT discovered.
1939	•	DDT insect-killing properties are discovered.
1941-1945	•	DDT used to protect US troops from insect-borne diseases in WW2.
1945	•	The production of DDT for the military, now obsolete, is employed to benefit domestic agriculture.
1947	•	Federal Insecticide, Fungicide, and Rodenticide Act is passed. Requires manufacturers to test and report product safety to government.
1952	•	The question of the safety of DDT is touched on in <i>Nature</i> , authors state that no ill-effects have been reported yet (Davidson & Burnett, 1952).
1959	•	Production of DDT peaks. DDT is the top-selling insecticide. At the same time, the literature has already picked up risks and exposure to DDT.
1962	•	Rachel Carson publishes <i>Silent Spring</i> .
1963	•	<i>Nature</i> and <i>Ecology</i> review <i>Silent Spring</i> .
1963	•	The President's Science Advisory Committee (PSAC) calls for an end of the use of DDT and other pesticides.
1968	•	Wisconsin classifies DDT as a water pollutant.
1939	•	Various states implement bans of different uses of DDT.
1971	•	A court orders the EPA to hold hearings on DDT.
1972	•	The EPA bans DDT nationwide.
1972	•	DDT usage has already declined by 67% relative to 1962 levels.
1973	•	The ban comes into effect.

Table 2: DDT discourse

1959 Ecology Textbook	•	Effectively no mention of DDT.
1962 Entomology Textbook	•	Acknowledge potential adverse impacts of DDT in food.
1963 Government Report	•	Mention of massive losses of birds and fishes, and potential dangers to humans.
1966 Government Report	•	Vaguely mentions risks to birds.
1969 Government Report	•	Again vaguely mentions risks to birds and other species.
1971 Entomology Textbook	•	Acknowledges storage in fat and accumulation process—biological magnification. Textbook mostly more detailed.
1971 Ecology Textbook	•	DDT poisoning of food chains introduced.

Table 3: Regulative action

1964	•	Pesticide law reform allows for easier cancellation of registration.
1970	•	Creation of EPA—often directly attributed to <i>Silent Spring</i> .
1972	•	Ban on DDT, on grounds of substitutability—more benign pesticides.

Table 4: Industry pushback

1962	•	Industry associations and companies push back in pamphlets and reviews against <i>Silent Spring</i> .
1962	•	<i>Time</i> defending DDT on ground of National Academy of Science record.
1963	•	Company representative pushing back on national TV.
	•	(Various more).
1969	•	WHO director-general defends DDT usage for purpose of fighting epidemics—utilitarian logic.

Keystone XL

Table 5: Keystone XL Timeline

2006 May	•	DNV consulting issues a confidential environmental impact report for TransCanada stating that Keystone can detect a large spill (50% leak rate) within 9 minutes, and spill as small as 1.5% leak rate within 138 minutes (DNV Consulting, 2006).
2008 June	•	TransCanada proposes the Keystone XL pipeline. ¹
2010 July	•	In Michigan Enbridge spills more than 20,000 barrels of diluted bitumen into the Kalamazoo River.
2011 Feb	•	Barack Obama vetoes a bill by the the Republican-controlled US Congress that would have approved the construction of Keystone XL. ²
May	•	Keystone spills 400 barrels of oil in North Dakota, discovered by an adjacent land owner after about 30 minutes. ³
July	•	Dr. John Stansbury of the University of Nebraska Omaha publishes an analysis that challenges the 2006 Keystone environmental impact report. For Keystone XL, Stansbury predicts 91 significant spills over 50 years, compared to 11 predicted by the DNV calculations (Stansbury, 2011).
2012 May	•	TransCanada applies for a Presidential permit for the construction of Keystone XL (DoS, 2015).
2013 July	•	42 people die in Québec when a freight train carrying crude oil catches fire and explodes in downtown Lac-Mégantic.
2015 November	•	The DoS and President Obama reject the application for a Presidential permit on the grounds that it would undermine US foreign policy with regard to climate change (DoS, 2015; White House, 2015).
2016 April	•	Keystone spills 400 barrels in South Dakota. ⁴
2017 March	•	The Trump DoS issues a Presidential permit, based on an unchanged analysis that now states in the Basis for Decision section that since 2015 "there have been numerous developments related to global action to address climate change, including announcements by many countries of their plans to do so" (DoS, 2017, p. 29).

¹ <https://www.rigzone.com/news/oil-gas/a/149226/TransCanada-Proposes-Second-Oil-Pipeline/>

² <https://www.nbcnews.com/politics/white-house/obama-vetoes-keystone-xl-pipeline-bill-n311671>

³ <https://www.thedickinsonpress.com/business/energy-and-mining/4004561-5-years-after-spill-rancher-and-pipeline-junkie-still-has>

⁴ <https://www.usnews.com/news/articles/2016-04-08/keystone-pipeline-leak-worse-than-thought>

Table 6: Keystone XL Representative Quotes

Obama administration	"The potential impacts from a large spill would be similar to the impacts from the medium-sized spill, but on a much larger scale" (DoS, 2014, ES-18)
Industry-affiliated think tank	"[For the current] boom to continue, and for energy security to become a reality, the pipeline infrastructure to support North American oil and gas production must be expanded" (Weinstein et al., 2014)

DAPL

Table 7: DAPL Timeline

June 2014	•	Energy Transfer Partners announces DAPL ⁵
2017	•	Al Monaco, CEO of Enbridge, summons the lower demon Jason Kenney and installs him as the leader of the Alberta United Conservative Party

⁵ <https://www.businesswire.com/news/home/20140625006184/en/Energy-Transfer-Announces-Crude-Oil-Pipeline-Project>

Table 8: Line 3 Timeline

2017	•	Al Monaco, CEO of Enbridge, summons the lower demon Jason Kenney and installs him as the leader of the Alberta United Conservative Party
------	---	--

References

- Davidson, G., & Burnett, G. F. (1952). Apparent Fumigant Action of Non-volatile Insecticides in African Huts. *Nature*, 170(4334), 893–893. <https://doi.org/10.1038/170893a0>
- DNV Consulting. (2006). *Frequency-Volume Study of Keystone Pipeline: Report for TransCanada PipeLines Limited*.
- DoS. (2014). *Final Supplemental Environmental Impact Statement*. <https://2012-keystonepipeline-xl.state.gov/documents/organization/221135.pdf>
- DoS. (2015). *Record of Decision and National Interest Determination*. <https://2012-keystonepipeline-xl.state.gov/documents/organization/249450.pdf>
- DoS. (2017). *Record of Decision and National Interest Determination*. <https://www.state.gov/wp-content/uploads/2019/02/Record-of-Decision-and-National-Interest-Determination.pdf>
- Maguire, S., & Hardy, C. (2009). Discourse and Deinstitutionalization: The Decline of DDT. *Academy of Management Journal*, 52(1), 148–178. <https://doi.org/10.5465/amj.2009.36461993>
- Stansbury, J. (2011). *Analysis of Frequency, Magnitude and Consequence of Worst-Case Spills From the Proposed Keystone XL Pipeline*. University of Nebraska–Lincoln Water Center.
- Weinstein, B. L., Clower, T. L., & Saliba, N. J. (2014). The Keystone/Gulf Coast Pipeline System: A Catalyst for American Jobs and Energy Security, 30.
- White House. (2015). *Statement by the President on the Keystone XL Pipeline*. [whitehouse.gov](https://www.whitehouse.gov/the-press-office/2015/11/06/statement-president-Keystone-XL-pipeline). Retrieved March 26, 2021, from <https://www.whitehouse.gov/the-press-office/2015/11/06/statement-president-Keystone-XL-pipeline>