POPSEC: HOWNO BLOW PELINE

HÅKAN GEIJER

Warning! This text is full of spoilers for the film *How to Blow Up a Pipeline*. If you haven't seen it yet, it's surprisingly enjoyable, so consider watching it first. :)



The 2022 film *How to Blow Up a Pipeline* follows a ragtag crew of novice eco-activists who conspire to blow up an oil pipeline in Texas as a means of making oil an unviable source of energy. It's based on the 2021 book of the same name by Andreas Malm where he argues in favor of sabotage as the logical conclusion of any eco-activism. The film is fun, and they manage to outwit the feds in pursuit of their goals, but what if the film relied a little less on mishaps to create drama and drive the narrative? What if it was seasoned radicals very carefully outsmarting an adept adversary? That might have been a little more interesting, thrilling even. What follows is suggestions for how the script could have been more realistic both considering what the feds could actually do and how the crew could actually pull off their direct action and get away with it. I'm a little late to the party with this analysis, but as they say: better late than never.

And if this is so late, then why do I find an analysis of it still relevant?

In September, flooding hit central Europe affecting Poland, the Czech Republic, and Austria. Later that month, hurricane Helene devastated parts of the US-American south. At the end of October, a year's worth of precipitation fell on eastern Spain causing massive flooding leaving us with shocking images of piled up cars in Valencia. Many more such incidents are occurring around the globe.²

Some activists have finally come to the realization that begging politicians to work against their interests to curtail oil production and sales will not produce the results we need at the pace we need if we want a future that is survivable for large swaths of the human and non-human population of the Earth. Symbolic protest like gluing oneself to the road is met with police, State, and vigilante violence. Those who throw soup on paintings protected by glass to "raise awareness" or do minor vandalism of office buildings of the worst perpetrators of climate change are met with swift retribution and stiff penalties, often with draconian prison sentences.³ Direct action done from the shadows and the development of a strong security culture begin to seem appealing.

Direct action is the exercising of one's own agency to affect change. It stands in opposition to asking others — usually an authority — to make

¹Twenty-six months late, to be exact.

²A sample from 2024 alone: the Afghanistan-Pakistan floods, the Rio Grande do Sul floods, the Enga landslide, Typhoon Yagi, Hurricane Beryl, and the heatwave in Bangledesh.

³As an example, 5 members of the Just Stop Oil protest group were sentenced to 4-5 years of prison for taking part in a video call in relation to the M25 motorway blockade in November of 2022. https://juststopoil.org/2024/07/18/whole-truth-five-sentenced-to-4-5-years-at-southwark-crown-court/

changes on their behalf. Examples might be shutting down pipelines, blocking the movement of goods, sabotaging equipment, making cars inoperable, or even other activities that might be labeled as terrorism by the State.

Security culture is the broad set of norms within a scene or network of activists that aims to combat repression and prevent the leaking of information. Investigation, infiltration, and snitching is how you get caught. Security culture is how you counter that. Operational security (OpSec) is a related concept. It's the methodical process of analyzing what useful information could be gained by an adversary and working to prevent that.

Activism in the so-called West is largely symbolic, based on the spectacle of mass protest or small but (allegedly) media-savvy performances. By default, activism appeals to progressive notions of pacifism, eschewing violence and all forms of direct action. It works within the system and uses "official channels" in pursuit of change. Many might want to move beyond performative acts but not know how.

As humans, we get inspired by looking to the stories around us. Some might take inspiration from this film. There is something powerful about seeing radical action happen on screen and having the activists portrayed in a positive light for a change. Much of the climate movement is not tightly involved with "classic" anarchist or "left" organizing where there is a wealth of historic and recent knowledge about direct action, security culture, and anti-repression work. Even further, basic activities like putting up wheatpastes might be hardly known or unclear in their methods or function.⁴ Perhaps the film has inspired you to try something new and direct, and if so, let this text offer some commentary on what may have been misrepresented or ill-advised.

Please notice that I am conspicuously not making a direct comment on the utility or desirability of the type of actions portrayed in the film, nor whether such acts are even remotely feasible, nor whether it's safe to attempt to create such devices at all.⁵ The lessons we can learn from the mistakes of the characters in the film are instructive for many other scenarios.

And finally, the film takes place in the present day with frequent expositional flashbacks that, in part, lead to a dramatic reveal later in the story. To more clearly show how the individuals were radicalized and how they formed then carried out their plan, this discussion will use the chronological order of events.



⁴Luckily, CrimethInc. has a guide for just that. See A Field Guide to Wheatpasting.

⁵Doing what the crew on screen does is not without risk. On October 31st this year, not even two weeks ago, an explosion in an Athens apartment killed one comrade and seriously injured another. See *Those who perish in the fire of struggle never die* for a statement about the death of Kyriakos Xymitiris. https://athens.indymedia.org/post/1632529/

After her mother's funeral, Xochitl talks with her friend Theo outside a suburban home near Los Angeles, California. Xochitl's mother had died in "freak heatwave" making her an orphan. Back at university in Chicago, Xochitl takes part in a planning meeting in a library with three others about a protest for a divestment campaign. When questioned about why she hasn't followed up on her assigned tasks, she snaps at two members for pushing market solutions saying they're too slow and ineffective. Shawn takes interest when she proposes that they "take more drastic action." He asks what she means, and Xochitl then suggests "actual sabotage, property destruction."

The untrustworthiness of progressives. Groups that are merely "progressive" but not radical typically do not respond well to calls for direct action. They often believe myths about peaceful, non-violent protests and will cite an imagined history of civil rights and labor movements to justify these beliefs. They believe that they must maintain good optics to persuade masses to join them — which they see as a prerequisite for social change — or respectability in order to be invited to the table to negotiate with those in power. To these ends, progressive groups will cast out members who are too radical. They will denounce radical actions that are taken in order to separate themselves from the "bad" protesters. In some cases, they will snitch on radical members to prevent them from taking actions in order to keep the more generalized movement respectable, the thinking being that any action taken outside their own determined bounds of acceptability must be preemptively quashed.

Xochitl might know this group well and assume that at worst they will not go along with her proposals. However, she also might be showing her hand too early either giving away too much to those she can't trust or making too large of a tactical jump from begging power to change to directly attacking it. She could have tested the waters with something smaller like basic vandalism to see how others felt and then used such smaller actions to build trust in order to more confidently carry out larger ones.



In his dorm room, Shawn doomscrolls through worrisome climate posts on social media while talking half-heartedly with his mother. He calls Xochitl, and they meet up in her dorm room. They put their mobile phones in her mini fridge, then sit next to it while they conspire. Over the course of their conversation they discuss — sometimes in jest, sometimes in earnest — attacking an oil refinery, kidnapping oil executives, blowing up a private jet, and building bombs.

Presumed affinity is not enough. Xochitl and Shawn both see the other as someone with similar political alignment and a shared desire for action. They feel it is safe to have these candid discussions because of their affinities and the fact

that they're not "strangers." They've met a few times, but not enough that Xochitl knows it's Shawn when he calls.

This is not enough to establish trust, however. Simple undercover agents, deep-cover infiltrators, and informants exist. The SpyCops scandal in the UK and parts of the Green Scare in the US are key examples of this, and both specifically targeted eco-activists. But more than that, even small and peaceful student groups have been targeted for surveillance by domestic intelligence agencies. Cops might engage in entrapment where they goad activists into illegal actions that are then used to imprison them. Engaging in minorly criminalized activity (e.g., tagging) with someone you just met might only be a minor security risk, but discussing bombing "critical infrastructure" is extremely risky. Another option would be for Xochitl and Shawn to attempt to verify each is who they claim to be.⁶

No half measures. Xochitl and Shawn both understand that their mobiles are "unsafe" in as much as they could be listening in, so they put them in the fridge because "common knowledge" suggests this prevents the recording of their conversation. First, doing so doesn't block sound; it only muffles it. Second, the fridge doesn't block signal. Both of these can easily be experimentally tested. Even if the fridge did block signal, if the mobiles are recording, the recording of their conversation could be sent as soon as the mobiles regain signal. It feels "right" and "secure" to hide the mobiles, but it's not enough to be actually effective. Further, Xochitl likely has a laptop in her room that could just as well have State-sponsored malware on it. They would be better off having this conversation while on a walk with all their electronics left behind.



In Parshall, North Dakota, Michael gets in a fight with an imported oil worker. He goes home and then gets in a heated argument with his mother. It's not the first time this has happened, and she says that she can't keep lying to the police. He stays with a friend and gets a job at a supermarket where he buys supplies to start making blasting caps. He records his process for his channel Boom Talk. On it he says, "If this works, then it'll be step one to making our own improvised explosive." While doing this, he gets a message via his channel from the user Xochitl. Fuentes that says "Hey — you're getting really good. Can we talk about a project?"

Don't draw attention to yourself. Michael either already has a criminal record or is at least known to the local police. In his heart he has intentions to act against oil companies, yet he films himself specifically saying that he's making homemade bombs. It might be legal to discuss the creation of blasting caps just

⁶See the texts Stop Huntin' Sheep: A Guide to Creating Safer Networks and Confidence Courage Connection Trust: A Proposal for Security Culture.

as there is quasi legality around 3-D printed ghost guns, but if one ever intends to use them for criminalized activity, they wouldn't want to be on the shortlist for investigation.

Beware of stings and honeypots. Michael has no way of knowing who Xochitl is, and Xochitl can't do the same with him. More likely than not, from either Xochitl's or Michael's perspective, the other person is genuine as stings are relatively rare, but the consequences of begin ensnared by one can be literal decades in prison. Police in many regions will use sting operations where they impersonate criminals in order to attract others into co-conspiring or soliciting their services. Notably, stings are used for arresting those looking to hire hitmen⁷ or illegally purchasing firearms or explosives. Some such stings can be quite complex when they have large targets such as the fake encrypted messaging app ANOM as part of Operation Trojan Shield (2018-21). Stings against activists aren't just carried out by police but also private groups like Project Veritas whose purpose isn't necessarily arrest but discrediting and turning public opinion. Broad networks of trust can help mitigate the need to cold call a stranger like this, but those take a long time to build up. Just like how Xochitl doesn't have connections to anyone with the requisite skills, activists in real life often do not either because of there being insufficient entry points into the movement, especially ways to build trust.8 If she wanted to be extremely careful, Michael has documented all his methods on his channel, and Xochitl could verify that information across other such channels and create the explosives herself. There's no need to directly involve someone unknown.



In Odessa, Texas, Dwayne lays traps and fires a shotgun into the air to deter oil company workers from coming onto his property. The oil companies eventually use legal means to seize his land. Following this, he's interviewed with his wife Katie by a filmmaker where Shawn is the audio technician. Shawn returns to Dwayne's and Katie's home that night after the interview went sour and says "The movie sucks... The only reason I joined is to meet people like you." He's looking for "People who live out here. People who know the land. People who want to fight."

 $^{^7}$ Ross Ulbricht (AKA Dread Pirate Roberts) of the Silk Road dark web marketplace allegedly tried to have his former employee Curtis Green killed. His would-be hitman was a US DEA (Drug Enforcement Agency) agent.

⁸And where there are, they often lead to useless socialist or platformist-anarchist orgs, ones who often care primarily about (or at least overly advocate) advancing their own organization at the expense of actually achieving goals. That, or they're just weird (sexual) abuse cults that grift money to line their leaders' wallets. For more on this, *Mass, the Left, and Other Walking Fossils* by the Curious George Brigade is a good place to start.

The continued perils of establishing trust. Shawn can be reasonably sure that Dwayne is authentically who he claims to be and that his beliefs and willingness to act are in alignment with Shawn's. Dwayne, however, cannot as easily do likewise. It might be unlikely that Shawn isn't who he claims, but police or even the oil companies themselves could be trying to catch him in a sting in order to prevent future disruptions to the oil pipeline. If we never extend our hands out to trust people, we'd never get anything of consequence done, but there always is some risk that spooks are among us. Before completely jumping in bed with someone, basic verification on parts of their life via soft or hard questioning can shed light on the kinds of inconsistencies infiltrators have.



Xochitl and Shawn join Dwayne and Katie at their home. Laid out on the table are marked topographic maps of the area the pipeline travels through as well as printed pictures from Dwayne's surveys. Three of them go over plans in detail, and Katie listens in and asks questions.

Information should be "need to know." We don't know what conversations happened off screen as to whether or not Katie wants to be directly involved in the pipeline sabotage, but what we know from later in the film is that she isn't. If she has made the decision to not be involved, she should be kept in the dark to the largest degree possible, and this might include Dwayne never introducing her to Shawn and Xochitl. She's seen Shawn before, and we can guess that when he proposed conspiring to Dwayne, that Dwayne told Katie immediately after since this is often what is done by people who aren't security culture conscious activists or those who are in heteronormative relationships. Xochitl hasn't yet decided her plan is to be the public face of the act of sabotage, so preventing Katie from knowing her still has benefits. Katie may be trustworthy, but people slip up or fold under pressure. What she doesn't know, she can't reveal.

Security is required for reconnaissance and planning too. Dwayne's printed pictures have a number of ways of being traced back to him. If he had them printed by an online service, copies of the data may still exist on their servers. If they were printed locally in person, someone may have seen them and thought it was suspicious. After the attack, the person might recall and report it. If Dwayne printed them himself, his printer might cache a copy in history of completed jobs. A way to prevent creating this evidence in the first place would be to use a dedicated memory card and then only display them on his computer via that card, but never transferring them to the laptop itself. The card can be destroyed after. Even better yet to prevent leaking of data via thumbnail creation or services that send all data

to "the cloud" like Microsoft's Recall, they could use a secure operating system on a USB like Tails. 10



Theo collapses at work while talking to her girlfriend Alisha. She learns that she has an advanced stage of a rare form of leukemia that's often found in people who live near oil and chemical plants. Xochitl comes back home and meets Theo and tells her she dropped out of uni. Theo is disappointed, and Xochitl asks Theo to turn her mobile off before explaining she did it so she could sabotage the oil industry. Theo goes to the church were Alisha is working with others to give out free meals. She tells her of Xochitl's plan, and Alisha is flabbergasted that she would even consider going along with it.

Some people shouldn't be told of direct actions nor convinced to join them. Absent a catalyzing event, it can take years to get someone to change their mind from opposition to support of direct action. The power of love and friendship are not always enough to undo a deep-seated (moral) belief in non-violence or decorum. It's unlikely conversations about it have never come up between Theo and Alisha, and Alisha's aversion should be clear enough to Theo that she shouldn't announce her escalation from working at a soup kitchen to bombing oil infrastructure. Later, this apprehension will be vindicated when Alisha threatens to call the cops on everyone. Sometimes it's best to compartmentalize your activities so that those close to you don't know what you're up to. You don't need to form a dream team of your closest friends to accomplish a task. Or, as the Bonanno quote goes: 12

It's easy. You can do it yourself. Alone or with a few trusted comrades. Complicated means are not necessary. Not even great technical knowledge.

Capital is vulnerable. All you need is to be decided.



In Portland, Oregon, Rowan, Logan, and others run from the cops after vandalizing and sabotaging construction equipment. Logan escapes, but Rowan is caught. An FBI agent threatens her with a 15-year prison sentence — even with a guilty plea — due to her acts falling under legal definitions of terrorism. The agent offers to work together with Rowan to get the charges dropped. Upon release, Logan greets Rowan and is

⁹AKA somebody else's computer.

¹⁰The Incognito Amnesiac Live System. https://tails.net/

¹¹Though, learning Theo has cancer could be that catalyzing event for Alisha.

¹² Armed Joy, Ch. IX.

suspicious then upset about how she got out so quick. "What the fuck did you do?" he asks. Later, they get ready to sleep in the bed of their station wagon. Logan says the FBI is bluffing. He questions if Rowan really cares and that this is what she signed up for. Rowan counters that she cares, but it's harder when there's no family lawyer she can call. He says he's not going to rat out his friends, and they should find someone else to rat on. Later in a book store, Logan sees Shawn reading the titular book and starts asking questions. Shawn says he's doing a project in Texas and needs collaborators.

Silence is security. So goes the old saying. When interviewed by the FBI, Rowan should have shut the fuck up until talking to a lawyer. Nothing good is going to come from talking. There is nothing worth saying other than nothing itself.

No, seriously. Don't tell strangers about your sabotage plans. The film would lose half its footage and most of its drama if the team wasn't assembled through these chance encounters, but Logan is exactly the reason why one should be cautious. First, strangers are remarkably unreceptive to even minor vandalism and might report you over that. Second, the kinds of strangers who immediately start talking about highly criminalized direct action are demonstrating poor security culture, and this likely extends to other aspects of their behavior and organizing. We need to be aware of how information spreads and how one overly talkative person can leak information and not just spoil plans but get everyone arrested. It's also not so simple as avoiding complete strangers. Just because someone is known in your social network doesn't mean you should trust them to not be a cop. They could be an informant. Getting off suspiciously easy for serious crimes is a classic sign of this.

Beware rich kids cosplaying proletariat. Logan being able to call the family lawyer and choosing not to — and specifically not doing so for his partner who doesn't have access to one — is privileged rich kid shit. It's not unique to rich kids, but they often toy with the movement more so than others, and they privilege the aesthetic of a proletarian and/or punk struggle over making material changes. This isn't to say that there aren't genuine class traitors in our ranks, ¹³ but those who we can call solid comrades will use their prior of current privileges to every advantage and call in all the favors they can. Logan choosing to not call a lawyer should be a much larger red flag for Rowan about where his priorities lie. In the film, his refusal to call in the family lawyer directly leads to him trying to throw a random activist under the bus to spare Rowan prison.



¹³Though, there is much to say about how previously having privilege or still retaining vestiges of it can dramatically shape someone's politics or moral compass.

Xochitl cleans tables at the end of her shift in an empty restaurant. Alisha shows up and says "Gimme one reason not to turn your ass into the police right now." Xochitl invites her inside and explains that she trusts Rowan and that she's just "a 22 year-old kid who got fucked over." Xochitl explains how Rowan came clean and that they've crafted a plan where Rowan feeds the FBI intelligence whereby they catch only Xochitl and Theo but none of the other co-conspirators. She claims the FBI "really just wanna look good" and that her and Theo's story being sympathetic might change legal precedent and inspire more sabotage.

Know the motivations and ideals of those you work with. The crew is in a bind, and how they handle the discovery of Rowan as a re-doubled agent¹⁴ depends on what they believe her primary motivators are. If she is committed to eco-activism and is willing to go to prison for it, it is possible she could be trusted to work with them on an offensive counterintelligence operation against the FBI. If her primary motivator is still to avoid prison, then she might flip again and betray the crew. The crew will not ever be able to say with certainty that her motivations are altruistic. That they've already worked with the informant and that she might have sufficient evidence to turn them in anyway complicates this analysis because refusing to involve her in the plans would expose her to failing as an informant and being imprisoned. There is no clear winning move.

Offensive counterintelligence is a dangerous game. Tales of offensive counterintelligence ops being carried out by activists against the cops are extremely rare. For such an op to succeed, it would need to be exceptionally well-crafted. Those carrying out the op would need to know with certainty what the police know and how they're operating. In the case of our heroes, do they know *exactly* what Rowan has told the FBI? Have the cops been doing independent surveillance of the group? This seems likely as would Rowan have identified the other members of the group at the request of her handlers. There can be no slip-ups where new information contradicts old information. They would have to completely trust that Rowan was genuinely revealing her informant status with no coercion. Had someone suspected it? Had she been accused? If she'd revealed under those conditions, it'd be impossible to trust her.

Don't base your plans on getting arrested. We threat model so that we can achieve our goals with minimal consequences, but this rather goes out the window when our goal is to explicitly face consequences. Civil disobedience and purposeful arrest might have had some effect 60 years ago and maybe even earlier in our lifetimes, but the world has changed, and legal systems are far more punishing for

¹⁴A double agent has allegiance to entity X but works for entity Y who tasks them with spying on X and they use this role feed misinformation to Y. A re-doubled agent is a double agent who flips or is flipped to have allegiance to Y so that now they are spying on Y's behalf against X while X believes they are still a double agent.

far smaller crimes than they used to be. It isn't noble to suffer. If Xochitl's goal is to prevent climate change, she is far more likely to achieve that by repeated acts of sabotage than by being smeared in the press as a terrorist.

From the perspective of her collaborators, they might trust Xochitl now, but can they trust her to not rat them out after breaking from her time in prison after 5 years? 10 years? 20 years? We can hope that our comrades are that strong, but we don't want to be in a position where we have to find out. One comrade purposely getting arrested endangers all co-conspirators.

Have a realistic understanding of the rules of the game. Strategy and tactics are inseparable from OpSec. Our goals inform our security. Our models of reality shape our goals. These both shape our strategy and tactics. Xochitl has the false belief that her imprisonment will cause a wave of activism. This film taking place in the US post-2020 would mean she saw the George Floyd Uprising and how his murder caught on camera is what caused people to rise up. While the ELF and ALF operated at a time when others were less aware and less interested in climate change or at least took it less seriously, we can still see that their propaganda of the deed didn't inspire a massive wave of copycat actions. Maybe things have changed, but reality doesn't track with that. If she'd had other news sources, read other histories, been exposed to other radical analyses, she'd see the world differently and choose a different path. This is the importance of radical theory and history.

Simply laid plans are the best ones. Xochitl's and Rowan's plan to feed the FBI false intel could very quickly go completely off the rails with no possibility of them avoiding prison. When plans are simple, it's harder for things to go wrong, and when they do, it's easier to recover from them or at least avoid catastrophe. Simple plans allow for more redundancy. Plans where everything must go *exactly* correct should be avoided where possible.

Know when to abandon plans. Achieving certain goals might be more important than avoiding consequences for pursuing them, but getting caught can preclude any future actions. We have to do the calculus of reasoning if our impact now is sufficiently large that even many future actions cannot sum to the current action's impact. This complexity is unknowable, and so we guess. Nevertheless, at some point we may have to recognize that our plans will not succeed. In Xochiti's case, having Rowan reveal herself as an informant should be enough of a suggestion that they're under surveillance that even acquiring the necessary supplies would be enough to get them arrested. That said, activists often walk away from plans they could have carried out. Repression and its resulting fear dominate our strategies.



We've finally reached the film's exposition montage. Xochitl slashes a car's tyres and leaves a printed note explaining her actions. They finalize details in a Signal group chat. Michael tosses his mobile onto a shelf at work. Theo smashes hers on the ground. Alisha, working as a cleaner at the home Theo where used to work, edits the metadata of security footage so that it says it's from two days later then calls in sick saying she'll come later.

Keep your eyes on the prize. In the immediate run-up to their action in which Xochitl plays a critical role, she wears identifiable clothing and with an uncovered face slashes tyres in the middle of the day. There's a time and place for minor actions, but she's jeopardizing the entire sabotage plan. Her getting caught could lead to her mobile or flat being searched, and this could turn up evidence that implicates her co-conspirators. At the very least, she should try to do this in a less conspicuous way.

Fully understand your mobile phone's risks. Earlier we see members of the crew hide their mobiles or turn them off before discussing sensitive topics. They have some understanding that their mobiles could record them, but they seem to not understand that this happens because the mobile could be hacked. If it's hacked, it's possible that it's fully compromised meaning Signal messages are readable. Leaving their mobile behind to have a private conversation but then having an equally private conversation on Signal leaves them open to arrest. Further, smashing a mobile might not destroy the data. Doing that or leaving one at work might be more suspicious than simply purging it and leaving it at home. An absence of evidence can be more suspicious than "normal" looking evidence.¹⁵

Metadata kills. Alisha's attempt to forge footage of her cleaning the client's house at the time of the sabotage is an alibi that will not hold up on close inspection. Dates might be stored in the file name, not just the metadata. The file system the data is written to will have metadata about the file's creation and last modification dates. Even if all these are addressed, there may be a conspicuously missing block of time from when the footage actually occurred, or there may be double footage two days later when the security system creates the actual files for that period. Even if the metadata isn't damning enough, weather might be recognizably different on the two days, someone might come by at that time and break the alibi, or the background hum of lights or other electronics could betray when the recording was actually made.¹⁶ This all assumes modification is even possible as many modern security systems stream to off-site tamper-resistant storage.

¹⁵For more on these security considerations, see *Mobile Phone Security for Activists and Agitators* (my zine) and *Signal Fails* (not mine).

¹⁶This is called electrical network frequency analysis. https://en.wikipedia.org/wiki/ Electrical_network_frequency_analysis



The crew arrives in four separate personal vehicles to the cabin that will be their base of operations. They set up living spaces and a kitchen, then get to work. They have printed instructions for building bombs and synthesizing explosives. Four go off to dig a hole where they will later plant one of the two bombs. Rowan uses her mobile to take photos of Xochitl and Theo — and only them — that she plans to later give to her handler.

Cars are traceable too. The crew has been bungling their OpSec with regards to their phones, so it's unlikely they've thought about whether or not their cars can be tracked via cell towers. Many modern cars have mobile data connections for downloading updates and maps. However, the crew lucked out that their cars are old enough that they don't contain such technology. The motorways they've taken to get from their places of residence to Texas likely had automated license plate readers, and some of the surface streets they've used may as well. If they are later investigated, querying this database could show that their cars were present. Dwayne's truck is the only one that isn't suspicious. Xochitl's van, Alisha's sedan, and Logan's and Rowan's station wagon all leave a trail back to them. This might not be enough to indict or convict them, but it might be enough for an agency with considerable time, money, and political backing to eventually follow every lead and get them onto a list for further investigation. Beyond that, they know that Rowan is known to the FBI. Her car could have a bug, and depending on what she told the FBI before she came clean, so could all the other cars too.

Use multiple locations. The crew uses the cabin for three purposes: as temporary barracks for them while they complete the operation, as a place to make the explosives, and as a place to later get intentionally caught by the FBI. If Xochitl and Theo want to be caught on location with evidence that only points to them with no DNA or other traces of the other five members of the crew, then they need at least two locations. They should have prepared the bombs at a separate location then created a fake lab at the cabin. Only Xochitl's van should have ever been at the cabin, and none of the other co-conspirators should have set foot on the property. By spending the night, they risk leaving DNA traces via hair, skin flakes, piss, and shit. They might leave items behind. They're leaving footprints and tyre tracks. The crew later tries to clean up and then destroy evidence with a smaller bomb, but these methods are unlikely to hide all traces.

Mobile devices known to the police should be assumed to be tracked. Rowan uses her mobile to communicate with her FBI handler. She cannot guarantee that the FBI isn't checking up on her location and doing independent surveillance

 $^{^{17} \}mbox{This}$ is very likely the case - but it isn't guaranteed - as I didn't research the specific models.

either with covert teams on the ground or even via satellite to check which cars might be present. Rowan only knows what her handler tells her. She can't know if a raid will come before she signals for it. Later that night, she sends pictures of partially assembled bombs to her handler. This alone is likely enough to get them raided, assuming everything else somehow hasn't.

Hit the target only once. The crew plants one of the bombs in two phases: they dig a hole with the intention of coming back later to actually place it. This means that the hole, directly next to a dirt road, is left obvious for something close to a full day. Workers coming across it might phone it in. The crew would be better off arriving early and digging the hole right before planting the bomb.



The crew makes a campfire and grills dinner. Theo pulls out a flask of alcohol to which Shawn says "Theo, what's with the alcohol? I though we were gonna keep a clear head." Logan further instigates the drinking. Rowan follows saying that she has a blunt, and Theo reveals she has a whole stash of hard liquor. Despite Shawn's and Xochitl's disappointment, they all(?) get drunk. In the morning, in various states of groggy hangover, they get to the day's work. Before leaving the cabin, Michael says "Alright. Last chance. Anybody want out?"

A clear head matters, actually. Sobriety is itself a loaded term, one that implies purity or that there's some default ground state from which we deviate by taking psychoactives. Reality isn't so nicely delineated. Medication — including cannabis — might help us be more "clearheaded" if it helps with pain or focus. However, genuinely medicating is not the same as assuming intoxication — even minor intoxication — doesn't negatively impact our focus, judgement, or performance. The crew is in an unfamiliar place full of homemade explosives, and they're trying to leave no traces. Drinking is only going to hurt them. Nearly every activist has a stack of stories of meetings, protests, and actions that went awry because of intoxication. Planting bombs while hungover and underslept is freakishly irresponsible. The crew should have established that intoxication is entirely unacceptable, and Shawn and Xochitl should have more clearly intervened.¹⁸

Identify the point of no return. Exactly when the possibility of escaping prosecution becomes negligible is never easy to pinpoint. Conspiracy to commit a crime is still a crime, and it's likely that once the specific plans were laid — the target, the means, the date — that all members of the crew were facing significant prison time. Perhaps backing out there could partially spare them, but by arriving

 $^{^{18}\}mathrm{I}$ know it's never that easy, but if there's ever a time enforced clearheadedness is reasonable, it's for something as critical and dangerous as this.

in Texas together, they are (likely) fully implicated in the plot. At this point, backing out creates more work and removes redundancies. Whoever backs out might not be spared any time in prison, and doing so might make it more likely someone else gets caught or injured. If possible, in the planning stage, they should have identified these key moments and impressed on others that beyond such points, everyone needs to be fully committed.



They all head to the first location to plant a bomb. Those who aren't planning to be implicated in the act wear thin gloves to avoid leaving fingerprints. While planting it, a survey drone flies by. Shawn suggests it's just using lidar to check for erosion. Dwayne knocks it from the sky. They finish planting them bomb then split up. Wearing disposable covers over their shoes, Rowan and Logan go to the service point to wait for the signal to shut off the flow. The others go to the exposed segment of pipe to plant the second bomb. While planting it, it falls on Alisha and breaks her leg. They manage to plant it anyway, then signal their success using a firework.

Do extensive reconnaissance. Had the crew done more reconnaissance of the area, they might have known that survey drones are used. Or, had they done more research about pipeline maintenance, they might have read about the same thing and been able to predict this threat. They should have known what surveillance and security measures were in place before making their plans. Had they had that information, it might have suggested that they carry out their plan at night or at least make the hole and plant the bomb at the same time.

Don't downplay threats. Shawn suggests that the drone only has lidar. When it falls, they suggest to leave it and carry on. There are many possibilities they haven't accounted for. If it's on auto-pilot, does it send alerts to its location if it encounters trouble? How fast would a team arrive to fix it? Did it have a visible light camera? Was someone piloting the drone in which case they'd have been immediately seen and reported? Assuming the least bad of all cases prevents them from taking active measures to ensure their plan's success.

Be unrecognizable. Given that aerial surveillance from planes or drones is a real issue, the crew should have taken countermeasures against being recognizable. They have distinct everyday clothing on, and save Dwayne, none are wearing hats or anything that even partially obscures their faces. That might not be enough alone to save them, but it does prevent instantaneous recognition. It might give them a chance to swap clothing and temporarily evade capture. They might be fugitives for life, but that may be preferable to decades in prison.

Always have a contingency plan. The crew seems to have no plan for if they got caught in the act either by camera or humans. If they were unlucky enough to have workers drive by, what would they have done? Is it too late to abort? Do they restrain the workers until it's done knowing their faces have been exposed? The moment a threat arrives is not the time to plan how to deal with it, especially one as trivially expectable as being caught committing a crime.

DNA traces get everywhere. Gloves might keep fingerprints off the barrels, but if the gloves themselves weren't newly purchased and kept exceptionally clean, there could be DNA traces on the outside. While handling the barrels, droplets of spit or sweat could be transferred to them. Dropping the barrel on Alisha likely transferred blood and clothing fibers to the barrel. Fire and explosions aren't enough to hide this, and there was no attempt made to clean it. Wearing disposable coveralls, face masks, and goggles could have reduced how much DNA would be transferred.

Everyone should be equally unidentifiable. If the goal of the action is to only reveal that Xochitl and Theo took part, then everyone — including Xochitl and Theo — should wear shoe covers so there's *only* treadless imprints. Two pairs of recognizable shoes with many round blobs would suggest the presence of at least a third person. This is a general security culture practice whereby everyone takes similar security measures so the ones who really need it blend in with everyone else.



At the pipeline's service point, Rowan suggests that they don't break in until the last possible second. Because of this, two oil company workers show up looking for the downed drone. To prevent them from reaching the drone and either finding the bomb or getting killed, Logan slashes their tyres then runs off. This gives Rowan a chance to shut off the oil flow, and after she sets off a second firework to signal that her work is done. She catches up to Logan and texts her handler that she needs assistance. Before the bombs go off, Dwayne goes to his usual pub and has a few drinks to create an alibi for himself.

Perfect plans and contingency plans revisited. The crew's entire plan revolved around playing the FBI so that they would believe only Xochitl, Theo, and Rowan were involved in the incident. Logan was spotted at the service point, and Rowan shut off the flow while he was being pursued. The two remotely detonated bombs went off immediately after. Rowan had to call in for help to her handler and then later lie and say she didn't know what was going on. It is honestly unfathomable that the handler would believe her story. The chance arrival of the

two workers in reality would have likely completely ruined their plan because now they have a description of one additional co-conspirator, and in particular one who is known to the FBI.

Seize every opportunity. Following from the previous point, Rowan was wrong to have waited to break into the service point and shut it down. Their plan was already actively under way, and there was increased risk of getting caught because of that. There was an opportunity to act, and she should have taken it. What if they couldn't scare off the workers? What if the workers caught them and called the cops? Would the others have set off the bombs anyway? Surely the workers would quickly shut off the flow. That might have been their only chance to achieve their goal, and it had the added benefit of being less likely for them to have gotten caught because no one was around. An opportunity not acted upon might mean having to later act at an inopportune time.

Alibis should be believable and boring. Dwayne seems to be known at the bar, and from the bartender's reaction, it seems his presence there in the middle of the day is not unusual either. However, he draws attention to himself by drinking more than usual to the extent the bartender says "Goin' hard today, D." Writing down the full plan of the least suspicious thing one could do is helpful because it forces actions to be calculated. In Dwayne's case, how long does he need to be at that bar? At what time and for how long? What is a normal number of beers for him to have drank in that period? Would that be 1 every 40 minutes? What should his pace be? Could he fudge the number a little lower to stay a little less intoxicated? When we get nervous, we act "weird," and this can be picked up on by those who know us.



Rowan sneaks Logan into her motel room then meets and successfully deceives her handler. Xochitl's message spreads across the internet. Cops arrive at the cabin as Theo and Xochitl set off a bomb to destroy the remaining evidence. Later, Shawn notices a black SUV following him outside his university, and Michael's mother gives him a knowing look. Another group of masked activists plants a bomb on a yacht and leaves the same manifesto Xochitl used.

Use disposable clothing and equipment. The clothing the crew wears including their shoes from the time they arrive until the time they leave need to be completely destroyed as does their equipment, and this should be done *before* they reach any location associated with them or that they believe would be later searched. For minor direct actions, some items might be reusable, and some items could be left in donation bins instead of being destroyed, but with stakes this high,

the crew should take maximum precautions. Having generic disposable clothing from a second-hand shop also means they will be less recognizable since they won't be wearing their typical everyday clothes. Michael in particular brings his bag of bomb making equipment onto the coach he takes home. It is possible that the police set up roadblocks and search vehicles leaving the area, and he wouldn't want this with him. He might want to have the opportunity to do other acts of sabotage and thus want the equipment for that, but he won't be able to if he's in prison. The time and monetary costs of security often must be weighed against how they can themselves inhibit the achieving of goals. Likewise, Dwayne goes to the bar in the clothes he was wearing while they made and planted the bombs. Explosive trace detection might be used on him and his property, so before arriving at his alibi location, he should have stripped, fully cleaned multiple times, and donned a clean set of clothes.

Be mindful of the long tail of security. OpSec doesn't end when an act is done. It requires indefinite silence and dilligence to prevent additional information from leaking after the fact. This might require keeping a particularly low profile or disengaging from public organizing. The crew might never be able to meet again because of the surveillance they've encountered, and there should potentially be a plan for alerting others about increased risk. Maybe the crew did this, but without even a single line about the need for silence or continued caution, we must assume there was no explicit discussion.



Not all these remarks were strictly about the operational security of how the crew could get away with their deed. Some was about planning and the tactical choices they made, and this is simply because most everything we do is done somewhat with opacity. We don't want the State or other adversaries to know what we're up to before we do it so that they can't prepare. We don't want them to know after either, even if what we're doing isn't (currently) criminalized. We want opacity and illegibility. We don't want to be known or understood by the State. This means, for example, the choice to have a public demo versus a spontaneous invite-only demo versus a secretive direct action have strategic, legibility, and security components to them.

With the changes proposed in this text, the film could have been less a motley crew stumbling to success and more a display of expert action. It might have taken away from the underdog feeling, but then again, there's a whole (informal) genre known as "competency porn" that's fun and thrilling for entirely different reasons. Maybe I selfishly want such a film to have been made so a partner and I would have spent less time screaming and throwing popcorn at the screen while watching it. Maybe I altruistically want such a film to have been made so that when others go out and do even minor actions, they aren't following a dangerous template.

It's just a film, though. These are just some thoughts from one person, which is to say, don't take them as absolute statements. With all matters related to security, always get a second opinion. Find multiple sources and interrogate why they disagree. I have my biases based on my various positionalities, and in particular where and when I operate. Read this again in 10 years, and maybe new police tactics, surveillance tech, or the political climate will make the film and this zine feel woefully dated. Or even today, the newly proposed script would not reflect a realistic struggle in a region outside the so-called "west."

Cultivate the dangerous weapon of critical thought.

 $^{^{19}\}mbox{For more on this, see James C. Scott's highly influential work Seeing Like a State: How Certain Schemes to Improve the Human Condition Have Failed.$