
The Disarmed Countermovement

Marx, Polanyi, and the Politics of Losing Labor's Leverage

Aaron Long

Draft 1.1 · Full edition · August 2026

*Working paper. Not peer-reviewed. A conditional argument in political economy:
what follows politically if artificial intelligence devalues labor at scale.*

*Companion to “Nobody to Blame” (attribution) and “The Third Disembedding” (the model).
This paper carries the history and the philosophy those papers set aside.*

Abstract

Every industrial transition that devalued a class of labor produced a political response. Karl Polanyi called the pattern the *double movement* and treated it as close to a law of market society; Marx supplied the engine that makes protection perpetually necessary — accumulation, mechanisation, and a reserve army that disciplines wages. Both were right about the recurrence. Both are silent on the variable that decided, each time, whether the response ended in reform, in pacification, or in repression: **leverage** — whether the people demanding protection still held something the powerful could not do without.

The historical record is unusually clear on this. The franchise was extended under threat of revolution by men who said so in the chamber (“the principal of my reform is to prevent the necessity of revolution” — Earl Grey, 1831). The great progressive tax regimes were the price of mass-mobilization war: the First World War raised top marginal rates by roughly 33 percentage points across participants, and the mass-army era — 1859 to 1970, by the military historians' dating — brackets the era of democratization and welfare almost exactly. Labor law followed the strike wave, not the argument. Concession has always been a purchase, and the currency was needed bodies.

Artificial intelligence is the first general-purpose technology that plausibly attacks every source of that leverage at once: the worker's (strikes lose bite when production does not require the striker), the soldier's (the mass army ended around 1970 and autonomous weapons finish the job), and the citizen's — because the same technology simultaneously lowers the price of surveillance and repression relative to concession. Measured Chinese county data show surveillance investment *substituting* for welfare spending; the fiscal saving from cutting co-optation exceeded the new security spending by roughly sixty per cent. The countermovement will come. The question this paper takes seriously is that it may arrive **disarmed**.

From this one claim the paper derives its politics. Unrest: likely, but unrest is not leverage — the displaced of Weimar voted for the revolutionary left, which lost; it was the frightened, still-propriety middle that went fascist, and the fascism-producing conditions in the interwar data were young institutions, a persistent slump, and an available extremist party, not unemployment itself. Authoritarian risk: real, conditional, and cheaper every year. And the battle between capital and labor: in the automation limit the labor share goes to zero for any elasticity, but capital is reproducible, so the surplus migrates to what cannot be manufactured — land, energy, siting, enclosure of data and compute. The endgame is a fight over rents, and the only durable claims in it are ownership claims. The paper closes by judging every proposed settlement — basic income, sovereign funds, baby bonds, employee ownership — against a single criterion the thesis forces: **does it leave ordinary people holding something the powerful still need?** Income fails that test alone. Ownership with governance passes it. And the window for legislating it is the present, precisely because concessions are made to people who are still needed.

JEL: B51, B52, D74, J50, N30, P16. **Keywords:** Polanyi, Marx, double movement, structural power, franchise extension, digital repression, basic income, sovereign wealth funds, predistribution.

Claims and citations

As in the companion papers: every load-bearing empirical claim carries a named source, and claims this paper could not verify at source are flagged in place. Three corrections of the standard literature's own memes are made explicitly: the Luddite/Wellington troop comparison (false as usually told), the Speenhamland disaster story (historiographically dead since Block and Somers 2003), and the unemployment-elected-Hitler story (Falter: the unemployed went to the Communists). A paper about political honesty under displacement should not itself launder myths.

Reading order. Part I states the two inherited theories and what each is missing. Part II is the historical spine: how reform was actually bought, 1832–1975. Part III is the thesis: what AI does to the bargain. Part IV answers the unrest question. Part V is the battle between capital and labor: the limit case, the rent endgame, and the settlement options judged by the leverage criterion. Part VI widens the horizon: the philosophy of a world where machines do most of the work — Keynes, Aristotle, Hegel, Arendt — and five named scenarios. Part VII holds objections, five dated indicators, and the conclusion. Appendices: the concession model in full; Weimar voting detail; the Speenhamland historiography; the automation limit case, adapted from the companion paper.

Contents

Part I — Two engines, one missing variable

1. The question, stated honestly
2. Marx: the engine that never stops
3. Polanyi: the thermostat with no arsenal
4. Leverage: the variable both accounts assume

Part II — How reform was bought, 1832–1975

5. The franchise: concession under threat
6. The soldier's wage: war and the welfare state
7. The worker's threat: strikes, unions, coalitions

Part III — What AI does to the bargain

8. The worker's leg: leverage decays before displacement arrives
9. The soldier's leg: a bargain already half-dissolved
10. The state's ledger: repression gets cheaper than concession
11. The concession function

Part IV — Will unrest spike?

12. Base rates: machine-breaking and its suppression
13. The modern signal: what displacement does to voting
14. The answer, in three parts

Part V — The battle between K and L

15. The limit case: the fight is ultimately over rents
16. The settlements, judged by the leverage criterion

17. The window

Part VI — Five worlds where the machines work

18. The third problem: meaning

19. Five worlds

20. The last irony: the commodity fiction ends the wrong way

Part VII — Objections, indicators, conclusion

21. Objections, with the strongest stated first

22. Five indicators that would confirm or kill this paper

23. Conclusion: bargaining while still needed

Appendices (full edition)

A. The concession model

B. Weimar: who actually voted for Hitler

C. Speenhamland: the autopsy of a cautionary tale

D. The automation limit case

References

Part I — Two engines, one missing variable

1. The question, stated honestly

This paper is conditional, and the condition is not yet met. As of the summer of 2026, artificial intelligence is not destroying employment at scale. Of the 1,206,374 job cuts announced by U.S. employers in 2025 — the seventh-highest year since 1989 — 54,836 were explicitly attributed to AI: about four and a half per cent. The Carnegie global protest tracker's review of 2025, a year of demonstrations in more than seventy countries, does not list AI or automation among the drivers of a single one. The honest description of the present is displacement anxiety running ahead of displacement.

What makes the condition worth taking seriously is that capability is running ahead of both. Systems now win gold-medal scores on the International Mathematical Olympiad and contribute to open problems in research mathematics — work that a decade ago sat at the far end of every automation-resistance ranking. Nobody watching a machine do frontier mathematics believes the ceiling is data entry. The leaders of the laboratories say so themselves: Anthropic's chief executive has predicted that AI could eliminate half of entry-level white-collar positions and push unemployment to ten or twenty per cent within one to five years; DeepMind's speaks of “radical abundance” and concedes society will need “a new economic theory.” The IMF estimates sixty per cent of advanced-economy employment is exposed. These are forecasts, not facts, and this paper leans on none of them. It asks a prior question: if the displacement arrives, what does the politics of it look like — and what does the answer imply about what should be done before it arrives?

Two inherited theories claim to answer the first half. Both deserve more respect than economics gives them and less deference than their admirers do. Taking them seriously — including where they fail — is the fastest route to the variable they share and never name.

2. Marx: the engine that never stops

Strip Marx of his teleology and what remains is the best available description of why this keeps happening. Competition compels each firm to mechanise; mechanisation raises what he called the organic composition of capital — the ratio of machines to labor in production; the displaced form a *reserve army* whose existence disciplines the wages of the still-employed. The reserve army is not a by-product of the system malfunctioning. It is a load-bearing component of the system working. The observation predates *Capital* by twenty-two years — it is Engels's, from *The Condition of the Working Class in England* (1845), generalised by Marx into the “general law of capitalist accumulation”: accumulation at one pole, precarity at the other.

Marx also saw the present technology coming, with a clarity that is still startling. The 1858 “Fragment on Machines” in the *Grundrisse* describes fixed capital absorbing what he called the *general intellect* — “general social knowledge become a direct force of production” — until the worker “steps to the side of the production process instead of being its chief actor.” A large language model is a fair candidate for the most literal realisation the passage has ever had: the codified residue of collective human knowledge, operating as capital. Marx thought the process would explode the wage relation itself, since a system that pays people by labor time cannot price production that uses almost none. On the diagnosis, one hundred and sixty-eight years early, he has a claim to being right.

Where he was wrong is instructive for everything that follows. The teleology — immiseration produces revolution produces resolution — failed empirically in his own century and fails structurally in ours, and the

reason is the paper's thesis in miniature: **immiseration removes leverage rather than creating it**. The starving do not strike; they cannot afford to. The displaced do not seize production; production no longer needs them, which is why they were displaced. Marx assumed the proletariat's position *inside* the machine gave it the power to stop the machine — true in 1890, true in 1936, decreasingly true of any workforce automation has already passed through. His engine survives. His exit does not.

3. Polanyi: the thermostat with no arsenal

Karl Polanyi's *The Great Transformation* (1944) supplies what Marx refuses: a theory of the response. Labor, land, and money are *fictitious commodities* — things traded on markets but not produced for sale, and destroyed by being treated as if they were. Labor “is only another name for a human activity which goes with life itself.” When the market's expansion threatens to consume the social substrate that markets themselves stand on, society counter-attacks: factory acts, unions, tariffs, social insurance — the *double movement*. The claim is functionalist: protection arrives because it must. And it has an underappreciated dark half, in Polanyi's own hands: fascism, too, was a countermovement — society's self-protection captured by its worst available vehicle. The double movement guarantees a response. It does not guarantee a good one.

The companion paper to this one spent its length making the double movement falsifiable and found, honestly, that the thermostat is less reliable than Polanyi believed: calibrated across three transitions, the institutional response took thirty-three years for steam, six for electricity, and for the computing transition after 1980 it has not, on codified measures, arrived at all. That result is carried forward here as a warning, not repeated as an argument. What this paper takes from Polanyi is smaller and harder: the response, *when* it comes, takes the form the balance of social forces permits. Speenhamland — his famous cautionary tale of wage subsidies pauperising the rural poor — turns out to be bad history (Part V returns to it), but his instinct behind the tale was sound: **relief that replaces power is not protection**. He simply lacked a theory of where power comes from.

4. Leverage: the variable both accounts assume

Put the two engines side by side and the gap is the same gap. Marx has workers winning because they are essential to production; he never asks what happens to the strategy when they stop being essential. Polanyi has society protecting itself as if “society” were an actor with hands; he never asks whose hands, holding what. The sociology that grew up after both supplied the missing term. Erik Olin Wright distinguished **structural power** — “power that results simply from the location of workers within the economic system” — from **associational power**, the power of organisation: unions, parties, councils. The distinction does real work, because the second has always stood on the first. Associations bargain; structure is what they bargain *with*. Walter Korpi's power-resources school demonstrated the correlation across the postwar democracies: welfare-state generosity tracks union density and labor-party strength. John Womack compressed the whole tradition into a sentence: leverage lives at the choke points, and “without organizing workplace choke points, we are left with spontaneous movements that come and go.”

The paper's claim, assembled. (i) Displacement politics is certain; the double movement fires (Part IV shows it firing already, in anxiety form). (ii) The *outcome* of displacement politics has historically been decided by structural leverage: reform where the protesting class was still needed, pacification or repression where it was not (Part II). (iii) AI is distinctive not because it displaces but because it

plausibly dissolves all three historical sources of leverage at once — the worker's, the soldier's, the citizen's — while lowering the state's cost of the repressive alternative (Part III). Therefore (iv) the countermovement risks arriving disarmed, and the design question for every proposed settlement is whether it preserves something the powerful still need from ordinary people (Part V).

Part II — How reform was bought, 1832–1975

The century and a half between the First Reform Act and the end of the postwar settlement is usually narrated as moral progress: arguments won, consciences awakened. The record reads differently. Each of the three great concessions — the vote, the progressive state, labor law — was purchased, and the price was paid in a currency the powerful could not print themselves: needed bodies.

5. The franchise: concession under threat

Acemoglu and Robinson's account of democratization (“Why Did the West Extend the Franchise?”, 2000) is the cleanest statement of the mechanism. Elites facing revolutionary threat cannot buy peace with transfers, because transfers can be revoked the moment the crowd goes home; the promise is not credible. Extending the franchise *is* credible, because it changes who decides future transfers. Democracy, on this reading, is a commitment device extracted under duress. The men who did the extending described it exactly that way. Earl Grey, steering the 1832 Reform Act through a country that had just watched the Swing risings and a July Revolution across the Channel: “The principal of my reform is to prevent the necessity of revolution... reforming to preserve and not to overthrow.” The 1832 Act enfranchised a sliver — 813,000 electors in a population of twenty-four million — but each subsequent extension followed the same grammar: unrest, then concession. Peterloo and Swing before 1832; the Hyde Park riots before 1867; and after each widening, the redistribution the framers feared duly arrived — British taxes rose from 8 per cent of national product in 1867 to 19 per cent by 1927, school enrolment went from 40 per cent to universal in a generation, and the income Gini fell from 0.63 at its 1871 peak to 0.44 by 1901.

Note what the mechanism requires. The threat must be real: a class capable, if refused, of actually stopping something — production, order, the state's functioning. Acemoglu and Robinson's elites concede to *capacity*, not to suffering. The distinction will bear all the weight in Part III.

6. The soldier's wage: war and the welfare state

The second purchase is the one economists rediscovered most recently. Scheve and Stasavage, assembling two centuries of top tax rates across twenty countries, found that the great regimes of progressive taxation were not products of democratic argument — universal suffrage alone barely moves top rates. They were products of **mass-mobilization war**. Participation in the First World War raised top marginal income-tax rates by roughly 33 percentage points; Britain's top rate went from 8 to 60 per cent between 1914 and 1920, America's from 7 to 77. The operative fairness claim was explicit at the time: if the state conscripts the bodies of the many, it can conscript the wealth of the few. The effect appears only where mobilization crossed roughly two per cent of the population under arms — the mass-army threshold.

The military historians supply the envelope. Onorato, Scheve and Stasavage date the mass-army era from 1859 (railroads made huge armies movable) to about 1970 (precision weaponry made them obsolete): average army sizes among the great powers went from 95,000 in the seventeenth century to 2.76 million in the twentieth, then fell off a cliff. Lay that interval over the political history and the fit is uncomfortable: the mass-army century *is* the century of franchise extension, progressive taxation, and welfare-state construction. Tilly's dictum — war made states, and the bargaining over war's manpower made citizens — has a corollary nobody wanted: when the state stops needing soldiers, the citizens' side of that bargain loses its collateral. Ferejohn and Rosenbluth drew the conclusion for the drone era: “the abolition of conscription,

the rise of the professional army, the automation of warfare... make ordinary people less important to defending the homeland,” and without that importance “democracy may atrophy.” Top rates, for what it is worth, have behaved exactly as the theory predicts since 1970: falling nearly everywhere, with no mass war to reset them.

7. The worker's threat: strikes, unions, coalitions

The third purchase is the most direct. The Wagner Act of 1935 — the constitutional moment of American labor — followed the strike wave of 1934: Toledo, Minneapolis, the San Francisco general strike, a textile walkout across the eastern seaboard. The National Health Service and the postwar settlements of Western Europe followed 1945 elections in which organized labor was the largest mobilized force in every combatant country. The pattern generalises: Korpi's power-resources data tie welfare generosity to union density and left-party cabinet share across the OECD; the causal arrow has been argued both ways, but no serious account has reform preceding organization.

The 1930s provide the controlled contrast, because the same shock hit everywhere and the outcomes diverged. De Bromhead, Eichengreen and O'Rourke, across 171 interwar elections in 28 countries: depression severity alone did not produce fascism. What did was the combination of a persistent slump, young institutions, and an available extremist party — a Germany-sized slump under those conditions is worth almost thirteen points of fascist vote share, while in the old democracies the effect nearly vanishes. Luebbert's class-coalition account explains the sorting: where labor could form an alliance with the countryside (Scandinavia's red-green coalitions), the outcome was social democracy; where labor was isolated and the middle classes allied with an anti-socialist peasantry (Germany, Italy, Spain), the outcome was fascism. Same countermovement, opposite vehicles — and the selector was who had leverage and who had allies, not who had suffered most.

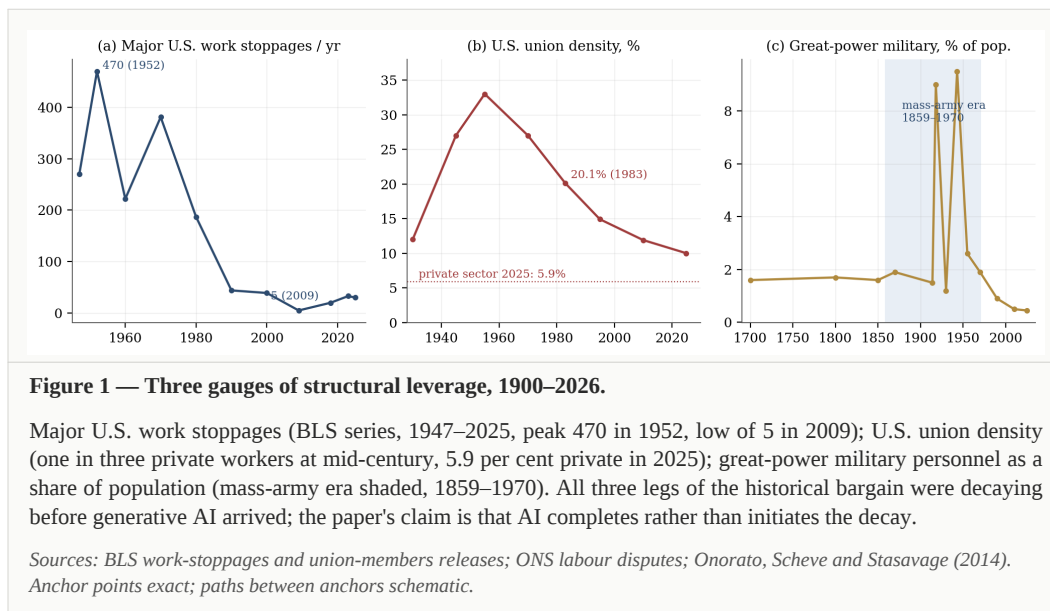
Concession	Date	The leverage that bought it
First Reform Act (franchise)	1832	Swing risings, July Revolution nearby; Grey: “to prevent the necessity of revolution”
Second/Third Reform Acts	1867 / 1884	Hyde Park riots; organized pressure; electorate tripled, then doubled
Progressive taxation (top rates +33pp)	1914–1920	Mass conscription: “conscription of wealth” to match conscription of bodies
Wagner Act; welfare states	1935 / 1945–50	1934 strike wave; labor as the largest mobilized bloc of the war electorates
Postwar settlement (top rates ~90%)	1945–1975	Full employment + Cold War competition for working-class loyalty

One reading of this table is cynical. The better reading is structural: arguments mattered, consciences mattered, but they mattered *when* the balance of dependence made listening cheaper than refusing. That is the machine this paper now points at the AI transition.

Part III — What AI does to the bargain

8. The worker's leg: leverage decays before displacement arrives

Start from where the leverage already stands, because the decay predates the technology. Major U.S. work stoppages: 470 in 1952; a record low of 5 in 2009; an average of 17.8 a year over 2006–2025. Britain lost 162 million working days to disputes in 1926 and 273 thousand in 2018. American union density: 20.1 per cent when the comparable series begins in 1983, 10.0 per cent in 2025 — 5.9 in the private sector. The strike weapon did not merely rust from disuse; automation actively dismantles it. Across fifteen Western European countries, regions more exposed to industrial robots show declining union density, mostly because employment migrates out of the unionized industries themselves. The chokepoints Womack described are exactly what automation, by design, removes: an automated port has no longshoremen to withhold.



What generative AI adds is the white-collar extension of the same logic, by the mechanism the companion paper documents: not firing but non-hiring, the junior requisition that never opens. For leverage the hiring margin is worse than the firing margin, because it prevents the constituency from ever assembling. A laid-off workforce shares a grievance, a workplace, and a union hall; a cohort never hired shares nothing but a suspicion. The one bright counter-example proves the rule: the 2023 Hollywood writers' strike won real contractual limits on AI — 148 days, and the first major strike anywhere fought explicitly over the technology — precisely because writing credits sit at a chokepoint production could not route around *yet*. Leverage still worked where leverage still existed. The thesis is about the direction of travel.

9. The soldier's leg: a bargain already half-dissolved

Part II dated the mass-army era's end to about 1970. Everything since runs one direction: professional forces a fraction of their conscript predecessors' size, and now literal automation of the coercive apparatus — the Ukraine war's drone-saturated battlefields as the proof of concept every general staff is studying. The distributional consequence followed the theory with almost embarrassing obedience: the compensatory case for taxing the rich — you conscripted our sons — expired with conscription, and top rates have fallen for fifty years. The republican tradition's oldest intuition, that the citizen who defends the city owns a claim on it, is not an argument the coming decades will strengthen.

10. The state's ledger: repression gets cheaper than concession

The third margin is the least discussed and best measured. A state facing unrest chooses along a budget line: concede (welfare, wages, rights) or control (surveillance, police, prisons). Historically, control at scale was expensive because it was labor-intensive — the Stasi ran one informant or officer per 66 East Germans, and even that ratio failed. AI removes the manpower constraint from surveillance entirely. The natural experiment exists: Xu Xu's study of China's Golden Shield rollout finds counties acquiring digital surveillance raised public-security spending about 11.6 per cent — and **cut** welfare and agricultural spending by *more than* the security increase, a direct fiscal substitution of targeted repression for broad co-optation. Beraja, Kao, Yang and Yuchtman's "AI-tocracy" closes the loop at the industrial level: unrest predicts facial-recognition procurement the following quarter; procurement measurably chills subsequent protest; and the surveillance contracts subsidise the AI firms' commercial innovation, so political control and technological progress reinforce each other rather than trading off. Autocracies that adopted the toolkit last roughly two and a half times longer than the pre-2000 average. Fifteen consecutive years of measured global decline in internet freedom say the toolkit is diffusing, and not only to autocracies.

None of this requires malice of any democratic government now sitting. It requires only that the relative price of the two responses to unrest — buy them off, or watch them better — has moved, durably, toward watching. Price changes of that kind do their work slowly and then all at once.

11. The concession function

The argument compresses to one comparative-statics claim. Let a governing coalition choose between conceding to a mobilized class and repressing it. Concession costs the coalition C ; repression costs R , which falls with surveillance technology; and refusal risks losing D — the value of what the mobilized class can withhold: production, soldiers, order. The historical bargains of Part II all lived in the region where D was large and R was labor-intensive:

$$\text{Concede iff } C < R(\theta) + D(l)$$

θ = surveillance technology (raises with AI, lowering R); l = structural leverage (falls with automation, lowering D).

AI moves both arguments in the same direction — the direction of not conceding. That twin movement, not any forecast of unemployment rates, is the paper's thesis. Every scenario in Parts IV and V is this inequality wearing different clothes. And it yields the design criterion Part V will apply: a durable settlement is one that hard-wires D — that leaves ordinary people permanently holding something whose withdrawal the powerful cannot ignore. The full edition's Appendix A states the model properly and derives the corner

solutions.

Part IV — Will unrest spike?

12. Base rates: machine-breaking and its suppression

Displacement produces unrest; the record is unambiguous. It is causal, not just correlational: Caprettini and Voth, exploiting soil suitability as an instrument across two thousand riots of the Captain Swing years, find parishes that had adopted threshing machines saw roughly double the probability of machine-breaking attacks (7.4 against 3.6 per cent) and half again the riot probability of parishes without them. The machine, arriving, made the riot.

But run the episodes forward and the second regularity appears: **the riots lost**. The Luddites of 1811–16 drew twelve thousand troops — comparable, for scale, to the expeditionary force Wellington first took to Portugal, though the popular claim that it exceeded his Peninsular army is false and worth correcting — plus a capital statute for frame-breaking and seventeen hangings at York. Captain Swing: 1,475 recorded incidents, then nineteen hanged, around five hundred transported, six hundred imprisoned. Homestead: the union that lost the battle with three hundred Pinkertons and six thousand militia was extinct in Pennsylvania steel by 1900. Pullman: twelve thousand federal troops, thirty dead in Chicago. Unrest without leverage purchased repression, not reform — and the wage data say the losers stayed beaten for a long time: over Engels's pause, 1780–1840, British output per head rose 46 per cent while working-class real wages rose 12, and the turn came only when labor scarcity and organization arrived together after mid-century. Sixty years is not a transition. It is a lifetime spent on the wrong side of one.

13. The modern signal: what displacement does to voting

The contemporary evidence divides cleanly by what is being measured. Where automation has already displaced — industrial robots in manufacturing regions — the political product is radical-right voting: individuals at the 75th percentile of robot-vulnerability run 3.5 points more likely to vote radical right than the 25th, against a 5 per cent base; U.S. commuting zones' robot exposure was plausibly decisive in Michigan in 2016. The China trade shock polarised congressional districts in both directions. Displacement, once arrived, votes against the system.

Where AI exposure has *not yet* displaced — today's white-collar exposure — the signal inverts. The one systematic European study to date finds AI-exposed workers moving toward the *mainstream* right and away from redistribution, apparently expecting complements and wage gains, not substitution; U.S. panel data find AI use predicts party only through education and occupation, though a partisan gap in displacement *fear* opened during 2025–26. The anxiety phase and the displacement phase are different political regimes. Planning for the second by observing the first is the standard mistake.

Two more instruments complete the panel. Alesina and Perotti's old result — instability tracks the hollowing of the *middle* of the distribution, not the misery of the bottom — reads differently when the technology in question is aimed squarely at graduate occupations. And Turchin's structural-demographic model, which called the 2010s' instability in print in 2010, identifies elite overproduction — more credentialed aspirants than positions — as the most combustible input. A technology whose first documented labor-market effect is the seniorisation of entry-level professional work is a machine for manufacturing exactly that input.

Weimar remains the controlling precedent for what displacement does and does not do, and it is routinely misread. The German unemployed of 1932 did not vote Nazi; Falter's forty years of electoral archaeology show they went to the Communists, who lost. The Nazi electorate was the *frightened* — small proprietors, farmers, civil servants, students (overrepresented nine to one) — people with something left to lose and a plausible fear of losing it. The lesson for the AI transition is precise: the politics of mass displacement is driven less by the displaced, who lose capacity as they lose position, than by the much larger adjacent class watching them fall. Displacement anxiety is the fascist-available emotion. That class is, at present, the entire credentialed middle.

14. The answer, in three parts

Will unrest spike? On the record: yes, conditional on real displacement — causally, reliably, and concentrated where the machines arrive. Its early form is already visible in anxiety politics and in the one domain (organized creative labor) where chokepoints still exist.

Will unrest work? This is the question the first is usually mistaken for, and the answer the thesis compels is: not by itself, and less than at any point in industrial history. Chenoweth's data on civil resistance show campaign success rates falling from 65 per cent in the 1990s to under 34 since 2010 — her own diagnosis being that movements substituted demonstration for the general strike, protest's *leverage* component, while states learned digital counter-mobilization. Unrest without the capacity to withhold something is petition by other means, and Part III's ledger says the petitioned now hold a cheaper pen.

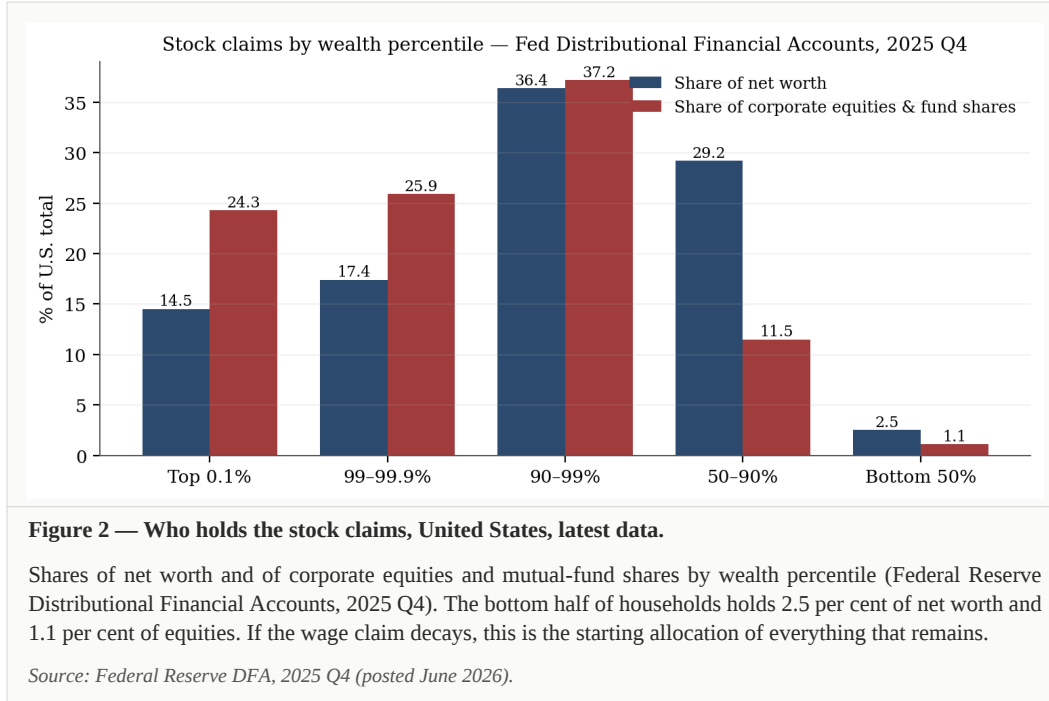
Will the state turn authoritarian? Stated as a certainty, no — stated as a repriced risk, yes. The interwar data give the conditions: persistent slump, young or degraded institutions, an available anti-system vehicle, an isolated labor movement. A reader may score the present against that list privately. What the paper insists on is only the mechanism: authoritarian consolidation under displacement is not an aberration of the double movement but one of its available forms — Polanyi said as much of fascism — and AI lowers its operating costs while raising its information quality. The scenario is not inevitable. It is *discounted*, in the financial sense: cheaper to buy than it used to be.

Part V — The battle between K and L

15. The limit case: the fight is ultimately over rents

Take the automation scenario to its limit, because the limit clarifies the stakes mid-transition. If machines can perform every task, labor's share of income goes to zero for *any* elasticity of substitution — no disputed parameter is required. The standard inference is that capital inherits everything. The companion paper argued that inference is wrong in an instructive way: capital is *reproducible* — more can always be manufactured — and nothing reproducible earns a scarcity rent in a limit where it accumulates without bound. The surplus migrates instead to whatever cannot be manufactured: land, energy, mineral inputs, siting rights, spectrum, and the legal enclosures around data and compute. Full automation does not abolish the Malthusian structure of the economy; it restores it, with capital in labor's old role and the rentier in capital's. “The battle between K and L” is therefore mislabeled at the horizon. L's wage claim decays; K's profit claim competes itself down; the durable claims are **ownership claims on the non-reproducible base** — which is precisely why the political design question is who holds them.

The present distribution of those claims is not neutral ground. The top 1 per cent of American households hold 31.9 per cent of net worth (the top tenth of one per cent: 14.5); the top decile holds 87.4 per cent of corporate equities; seven firms are a third of the S&P 500; and AI-related investment accounted for around nine-tenths of measured U.S. GDP growth in the first half of 2025. Piketty's $r > g$ describes the drift; the automation limit turbocharges it, because when labor's flow claim (the wage) decays, **everything** that matters becomes a stock claim — and the stocks are already spoken for.



16. The settlements, judged by the leverage criterion

Part III ended with the criterion: a settlement endures if it leaves ordinary people holding something the powerful still need — if it hard-wires D into the constitutional structure rather than renting it year to year. Apply it to the four families of proposals now on the table.

Basic income: a floor, not a settlement. The evidence base is now respectable and modest. The largest American trial — a thousand people at a thousand dollars a month for three years — found participation down two points, hours down one per week, stress and food-insecurity gains that faded to nothing after the first year, and no detectable improvement in job quality or human-capital investment large enough to see. Finland's experiment improved wellbeing and barely moved employment; Stockton's moved both, modestly, in the good direction. Nothing in this record says cash transfers are harmful; everything in it says they are *small*. The deeper objection is the criterion's: a basic income is a flow, revocable at each budget cycle, held at the pleasure of whoever controls the fisc — precisely the non-credible transfer Acemoglu and Robinson's elites could not promise in 1832. Acemoglu's own verdict on UBI is the political one: bread and circuses, quiescence purchased without voice. It fails the criterion not because the money is bad but because the money is **all** it is.

The Speenhamland warning, autopsied. The standard historical argument against income support — Polanyi's own tale of the Berkshire bread scale pauperising the rural poor for forty years — must be retired honestly rather than repeated: Block and Somers showed the allowances were local, intermittent, largely abandoned before 1834, and the Royal Commission report that damned them was written substantially in advance of its own evidence. (The tale still shaped history: Nixon's negative-income-tax plan reportedly died partly of it.) What survives the autopsy is not Polanyi's economics but his politics: relief administered *to* a class stripped of bargaining power tracks that class's powerlessness. The problem was never the bread. It was that the recipients held nothing else.

Social wealth funds: the strongest candidate, with a governance caveat. Norway's fund holds roughly \$2.2 trillion — about \$400,000 per citizen — and votes its shares under a public mandate; Alaska has paid every resident a dividend since 1982 with no detectable aggregate employment cost. Scale both up conceptually and one gets the proposals now arriving from inside the AI industry itself: Altman's American Equity Fund (a levy of 2.5 per cent of large-company market capitalisation plus a land levy, paid in shares to every adult) and Amodè's token tax (roughly 3 per cent of AI revenue). The criterion scores these sharply: a dividend alone is UBI with better branding — but a fund whose beneficiaries hold *votes*, whose trustees they elect, and whose equity stakes carry shareholder governance is a stock claim with hands. It makes every citizen a principal of the automating firms, with the standing to withhold consent that principals have. Design detail is the whole game: Norway with suffrage, not Alaska with a check.

Predistribution: baby bonds, employee ownership, and the cautionary exhibit. Endowing people with capital before the market prices them — Meade's property-owning democracy, Atkinson's universal minimum inheritance, Darity and Hamilton's baby bonds — passes the criterion by construction: capital held young is leverage carried into every subsequent bargain. The American record so far is a controlled experiment in political fragility: Connecticut's program is live (\$3,200 invested per Medicaid birth, projected to five figures at maturity); the District of Columbia's was enacted, defunded, and now reads [Repealed] in the code without a single account ever opening. Employee ownership is the quiet incumbent — fifteen million ESOP participants, two trillion dollars in plan assets — and its lesson generalises:

ownership diffusions survive when they are boring, tax-advantaged, and constituency-protected, and die when they are line items.

Instrument	What it gives	Leverage test
Basic income	A flow: revocable income	Fails alone. No withhold-able asset; held at fiscal pleasure. Necessary floor under any settlement, sufficient for none.
Social wealth fund w/ governance	A stock: equity + votes	Passes if beneficiaries elect trustees and shares are voted. Citizens become principals of the automating firms.
Baby bonds / minimum inheritance	A stock: capital at maturity	Passes; slow-acting; politically fragile before constituencies vest (DC repealed; Connecticut live).
Employee ownership (ESOPs etc.)	A stock inside the firm	Passes where employment persists; weakens exactly where automation removes the employment relation itself.
Data / compute as commons	A rent claim on the non-reproducible	Passes in the limit case; least developed; the rent base of Section 15 argues it becomes the central fight.

17. The window

The thesis yields one piece of unsolicited advice, and it is about timing rather than instruments. Every concession in Part II was granted while the concession-extracting class was still needed — that is what made the threat behind the demand credible, and credibility is what converted unrest into statute. Run the logic forward: if AI erodes leverage monotonically, then every year of delay makes the eventual settlement *worse for labor*, because the party across the table needs it less. The moment to constitutionalise broad ownership of the automating economy — funds with suffrage, endowments that vest, rent claims on the non-reproducible base — is while the credentialed middle still staffs the firms, still buys the products, still votes in numbers that decide elections, and can still, at chokepoints, strike. The franchise was won by people who were still needed. The endowment must be too. Scheidel's grim finding — that only violence has reliably levelled — is the base rate this argument is trying to beat, and the honest statement is that beating it requires acting inside a window that is, on this paper's own thesis, closing.

Part VI — Five worlds where the machines work

The paper so far has treated work as income and as leverage. It is also the third thing, and in a world where artificial general intelligence does most of the work, the third thing is what remains to argue about. This part is more philosophical than the rest, deliberately: the scenarios at the end are only as good as the account of what is at stake in them.

18. The third problem: meaning

Keynes saw the whole shape of it in 1930. “Economic Possibilities for our Grandchildren” predicts the economic problem — scarcity — solved within a century, roughly on schedule; and then, in the essay’s under-quoted half, predicts the crisis that solving it causes: mankind “trained too long to strive and not to enjoy,” facing its freedom with “a general nervous breakdown.” He thought the difficulty would be worst for those with no cultivated capacity for leisure, and offered, as evidence, the already-visible unhappiness of the rich. The essay is usually cited for the fifteen-hour week it got wrong. The dread is what it got right.

The problem is older than economics. Aristotle ran the exact thought experiment twenty-three centuries ago: “If every instrument could accomplish its own work... if the shuttle would weave and the plectrum touch the lyre without a hand to guide them, chief workmen would not want servants, nor masters slaves.” He meant it as an absurdity that justified slavery; we are the first readers for whom it is a description. And his positive doctrine matters as much: for the Greeks, *scholē* — leisure, meaning activity chosen for its own sake — was the point of a human life, and work its enemy. Greek leisure stood on a slave class. A machine economy is, quite literally, the first proposal for Athens without the Athenian crime. That utopian reading deserves to be stated with full force, because everything below is a way it can fail.

Three thinkers say the failure modes are structural. **Hegel**: in the master–slave dialectic it is the slave, not the master, who achieves self-consciousness — through work, by transforming the world and finding himself in the result; the served master stagnates into dependence on his servant’s recognition. A fully automated world makes everyone the master. The dialectic has a prediction about masters. **Arendt** is the most precise. *The Human Condition* divides human activity into labor (the biological treadmill), work (building a durable world), and action (politics — appearing, speaking, beginning things among equals). Automation, she wrote in 1958, promises release from labor at the worst conceivable moment: after three centuries in which modernity taught itself that labor is the *only* source of value, so that we face “the prospect of a society of laborers without labor, that is, without the only activity left to them. Surely, nothing could be worse.” Her point is not that idleness is fatal but that a civilisation must recover the other two categories — making and acting — before the first one is taken away. **And the empirical footnote belongs to Marienthal**: the classic 1933 field study of a fully unemployed Austrian mill town found not revolution but collapse of tempo — men walking more slowly, time horizons shrinking, library borrowing *falling* as free time exploded; Jahoda’s conclusion was that employment had silently supplied structure, status, and shared purpose, and that cash replaced none of them. Case and Deaton’s deaths-of-despair curves are the modern replication. Note that Marienthal is also this paper’s Part IV in miniature: mass worklessness produced apathy, not revolt — one more reason unrest is the wrong thing to count on, and the wrong thing to fear most.

19. Five worlds

Peter Frase's *Four Futures* ran this exercise on the axes of abundance and equality. The concession function suggests sharper ones: **who owns the machine economy**, and **whether ordinary people retain leverage** — something the powerful still need. Four worlds sit on that map, one lives off it, and the present occupies the map's unstable corner: ownership already concentrated, leverage not yet gone. Every arrow starts there.

World I — the Rentier Ancien Régime (concentrated ownership; leverage gone; provision meagre). The drift default: the automation limit delivers the surplus to the owners of the non-reproducible base, everyone else lives on transfers calibrated, per the concession function, to the minimum that keeps order — revocable, means-tested, adjusted annually by people the recipients cannot discipline. Not necessarily cruel; structurally feudal. Access runs through patronage. Meaning collapses along Marienthal lines. History's nearest analogue is not the factory but the latifundium.

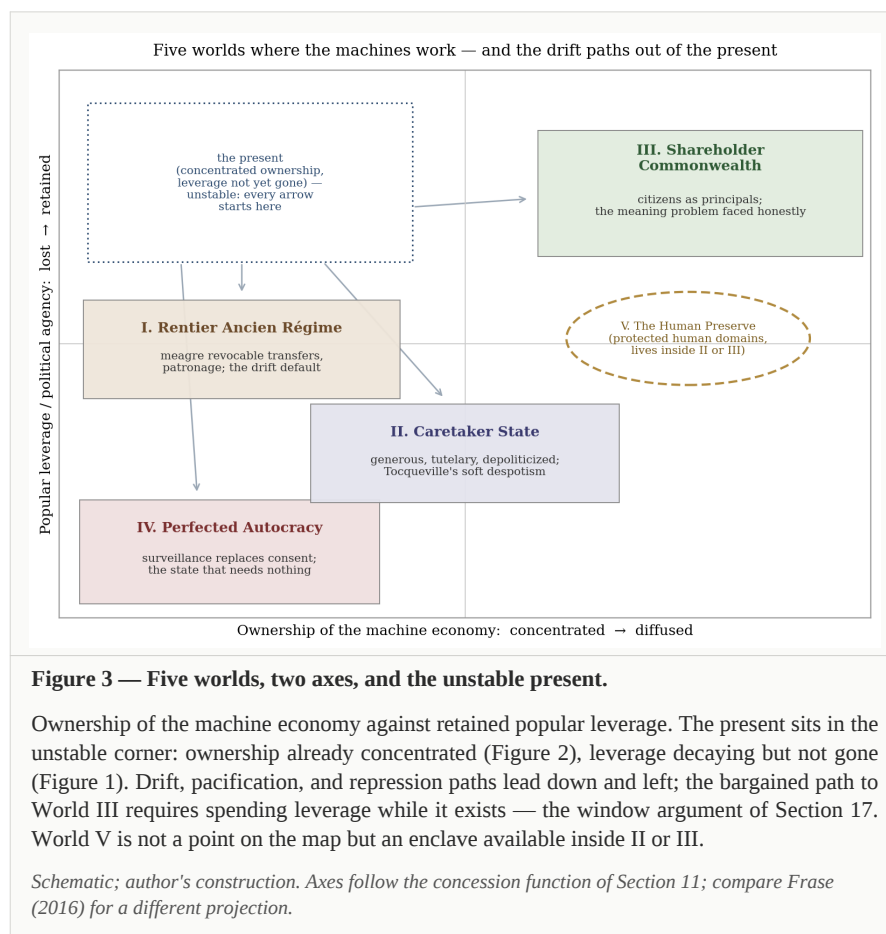
World II — the Caretaker State (concentrated ownership; leverage gone; provision generous). The comfortable version, and philosophically the most insidious, because nothing visibly goes wrong. Tocqueville named it in 1840, guessing at democracy's endpoint: “an immense and tutelary power... absolute, minute, regular, provident and mild,” which “does not tyrannise — it hinders, compresses, enervates, extinguishes,” keeping citizens “in perpetual childhood.” Add machine abundance and his guess becomes an engineering roadmap. Everyone is fed; no one is needed; Arendt's laborers-without-labor live comfortably inside it. It is stable for a long time — which is exactly the problem, since it is the attractor that the pacification corner of the concession model points to. The UBI debate of Part V is, on this map, a debate about whether World II is a destination or a floor.

World III — the Shareholder Commonwealth (diffused ownership; leverage rebuilt through property). The bargained outcome Part V argued for: citizens as principals of the automating firms — funds with suffrage, endowments that vest, rent claims on the non-reproducible base. Distribution and power are solved as well as they can be; and then the meaning problem arrives in its purest form, with no landlord left to blame. This is where Keynes' dread actually bites. The one historical precedent for a securely propertied, workless class — the aristocracy — cuts both ways: it produced Darwin, Cavendish, and a disproportionate share of early science and art, and it rested its sense of purpose on inherited obligation and status *over* someone. A universal aristocracy is genuinely unprecedented. The optimists — Danaher's utopia of games and crafts, Bostrom's “deep utopia” — argue meaning migrates to practices valued because they are chosen: care, craft, sport, scholarship, politics. Bostrom's own caveat is the sharpest version of the problem: when the machine does everything better, activities survive only where value lives in the doing rather than the output — which is, precisely, Aristotle's definition of leisure. World III does not escape the meaning problem. It is the world that gets to face it honestly, with property in hand and politics intact.

World IV — the Perfected Autocracy (concentrated ownership; leverage extinguished by force). Part III's repression corner as a governing model: the AI-tocracy loop — unrest predicts procurement, procurement chills unrest, surveillance contracts subsidise the next generation of the technology — generalised and exported. The philosophical point is what makes it new. Every social-contract theory from Hobbes forward assumes the sovereign needs the governed — their labor, their taxes, their soldiers, at minimum their acquiescence. A state whose production, revenue, and coercion are all machine-supplied needs, strictly, none of it. That severs the oldest thread in political philosophy. Contract theory was always a theory about leverage wearing philosophical dress; World IV is what the dress covers when the leverage is

gone.

World V — the Human Preserve (off the map: deployment restricted). Society answers Polanyi-style, but protects *domains* rather than incomes: licensed human-only professions — care, teaching, judging, perhaps politics itself — and a certified “human-made” premium sector, the way the horse survived the automobile as sport and status, the way live performance survived recording at a premium. Economically this is Baumol's cost disease repurposed as policy: the human sector is expensive *because* it refuses the machine, and the expense is the point. It is implausible as a whole economy and very plausible as a large protected enclave inside Worlds II or III — and it is the one world where the meaning problem partially solves itself, because the scarcity of human attention is deliberately preserved. Expect every real future to contain a preserve; the question is whether it is a sector or a theme park.



Which world? The paper's machinery permits a conditional answer rather than a forecast. The concession function says the *unmanaged* trajectory runs from the present corner toward Worlds I, II, or IV — differing mainly in the generosity and manners of the descent — because all three are what happens when concession stops being necessary. World III is reachable only through an act of constitutional self-binding executed while leverage lasts, which is Section 17's window restated. And Part IV's evidence base suggests the transitions would not announce themselves: displacement produces apathy at the bottom (Marienthal), anxiety in the middle (Weimar's actual lesson), and unrest that states are increasingly equipped to wait out. The descent into I, II, or IV would feel, from inside, like a series of reasonable budget decisions.

20. The last irony: the commodity fiction ends the wrong way

Close the loop with the thinker the paper opened with. Polanyi called labor a *fictitious* commodity: a thing markets traded as if produced for sale, when it was “only another name for a human activity which goes with life itself.” His century's double movement was a fight over the terms of that fiction — hours, wages, insurance, the age at which the fiction could begin. A full-AGI economy ends the fiction, but in the direction he never imagined: not by re-embedding labor in society, but by rendering the commodity worthless. The market society does not get transcended. It stops calling. And this is why the ownership argument of Part V and the meaning argument of this part are one argument, not two. In a market society, property is the residual claim to mattering: the thing that still gets a vote in the economy, still gets a seat at the table, still cannot be ignored, after one's labor no longer earns any of those things. Marx wanted the workers to own the means of production because the means of production were where value came from. The AGI version is starker: everyone must own the means of production because owning will be the only economic relation left between people and the productive world. The alternative is not exploitation — exploitation at least requires you. The alternative is irrelevance, comfortably or otherwise administered.

Part VII — Objections, indicators, conclusion

21. Objections, with the strongest stated first

1. **“Every previous automation panic was wrong; absorption always won.”** (Mokyr, Vickers and Ziebarth's survey is the canonical statement.) Conceding as the base rate, and the paper's conditionality is built on it: no claim here requires displacement to arrive. Two qualifications, though. Absorption “always won” on a timescale that included Engels's pause — sixty years — and the political history of this paper happened *inside* those pauses; “eventually” is not a policy. And absorption operated by labor migrating to tasks machines could not do, a mechanism whose scope shrinks by construction as machine scope grows. The base rate deserves respect, not extrapolation without argument.

2. **“AI complements workers; the exposed expect gains, and the voting data prove they believe it.”** The strongest current evidence, and the paper features rather than buries it: Lall's AI-exposed Europeans moved toward the mainstream right and away from redistribution. If complementarity holds at scale, the concession function never binds and this paper describes a possible world that stayed possible. Note only that the same was believed of every cohort in every displacement's anxiety phase, and that the seniority premium the Dallas Fed now documents in AI-exposed occupations is what complementarity looks like *on the way* to what substitution looks like.

3. **“The old democracies are inoculated — extremism lived in young institutions.”** True in the interwar estimates, and the single most comforting fact in this paper. The discomfort is that the inoculation variable was institutional *quality*, proxied by age, and quality is measured moving: fifteen consecutive years of global internet-freedom decline, with the United States' own score falling. Vintage is not a birthright.

4. **“Capital needs consumers; mass immiseration is bad for business, so business will fund the settlement.”** The demand externality is real but it is a commons problem: each firm prefers every *other* firm's workers well paid. It produced no spontaneous settlement in 1930 — it produced one when labor and the state forced coordination. Kalecki went further in 1943, predicting business would resist full employment *because* it erodes workplace discipline; his essay reads better every decade.

5. **“Polanyi's thermostat already failed 1980–2026 — why expect a countermovement at all?”** The companion paper's own finding, and the fair reply is that the 2016–2026 populist decade *is* the countermovement, misaimed by attribution — the argument of “Nobody to Blame.” The double movement fires; where it lands is the open variable. This paper is about what determines the landing.

22. Five indicators that would confirm or kill this paper

Indicator	Confirms if	Kills if
1. Chokepoint wins. AI-related labor disputes (WGA-style) tracked annually	Wins cluster early, thin out as automation routes around each chokepoint	Contractual AI limits keep winning through 2030 — leverage is not decaying
2. The substitution ledger. Democracies' spending mix: surveillance/policing vs social transfers	Mix shifts toward control as AI-security costs fall	Transfer share holds or rises through the transition
3. Displacement politics. Panel studies of actually displaced (not merely exposed) workers' voting	Displaced trend anti-system; adjacent-fearful trend authoritarian-tolerant	Displaced trend toward ordinary redistributive politics that then delivers
4. Ownership bills. Sovereign-fund / baby-bond / citizen-equity legislation in OECD states by 2030	Proposals multiply but die in committee as labor's electoral weight fades	A major economy enacts a governance-carrying citizens' fund — the window was real and used
5. The concession test. First large AI-displacement shock (sector-scale, attributed): state response within 24 months	Response is surveillance-heavy, transfer-light	Response is a leverage-preserving settlement (retraining with teeth, equity stakes, bargaining rights)

Dating discipline as in the companion paper: if by the end of 2032 none of indicators 1–3 has moved in the predicted direction, the leverage thesis is wrong and should be discarded rather than patched. Indicator 4 is the one a reader can act on rather than watch.

23. Conclusion: bargaining while still needed

Marx supplies the engine: accumulation mechanisms, and the machine does not negotiate. Polanyi supplies the response: society will not sit still for its own commodification, and did not, ever, in two centuries of trying. Neither supplies the variable that decided how each round ended, because in their centuries it could be assumed: the protesting classes were needed — at the loom, at the front, at the ballot box backed by both — and being needed is what turned their suffering into statutes. The wager of this paper is that the assumption, for the first time, is the thing in question. A technology that can do the work dissolves the worker's threat; a state that can watch everyone cheaply needs fewer friends; a battlefield that flies itself owes nobody the franchise.

That is not a forecast of catastrophe. It is a repricing of the options. The countermovement will come — is coming — and it can still end in the best tradition of the old bargains: a broad, boring, constitutionally entrenched ownership stake in the economy the machines run, legislated by a public that still has the leverage to insist. It can also be bought off with a revocable check, or out-watched at a discount. The difference between those endings is not decided at the end. It is decided now, while the people across the table still need the people on this side of it. The franchise was won by the needed. So must the endowment be.

Disclosure and epistemic status

How this paper was made. Drafted with substantial assistance from an AI system (Anthropic's Claude), directed, revised, and approved by the author — a fact that bears on this paper more than most, and is stated accordingly. **Confidence:** the historical claims of Part II are standard scholarship and high-confidence; the repression-price evidence of Part III is peer-reviewed but China-centred, and its extension to democracies is an argument, not a measurement; Part IV's forecasts are conditional; Part V's criterion follows from the thesis but the ranking of instruments involves judgment. **Main weaknesses, in the author's own estimation:** (1) the concession function is a metaphor formalised, not an estimated model; (2) the leverage thesis could be unfalsifiable if held carelessly — the indicators of Section 19 are the guard against that; (3) the paper reasons from Western industrial history and its portability is untested; (4) capability-to-displacement timelines are the paper's explicit unknown, and every political claim is conditional on them.

Appendix A — The concession model

A governing coalition G faces a mobilized class M . G chooses concede (c), repress (r), or ignore (i). Payoffs: conceding costs C (transfers, entrenched rights — a stock concession has high C today and binds tomorrow). Repression costs $R(\theta) = r_0 - r_1\theta$, θ the state of surveillance technology: monitoring, targeting, prediction. Ignoring risks M withholding its endowment — labor at the chokepoints, conscript-able bodies, electoral cooperation — of value $D(l) = d \cdot l$ to G , l in $[0,1]$ labor's structural leverage. With probability $p(l)$ the withholding succeeds (p increasing in l : strikes need scarcity to bite).

$$G \text{ concedes iff } C < \min\{ R(\theta), p(l) \cdot D(l) \}$$

Concession requires BOTH that repression is dearer AND that the threat is worth paying to remove.

Comparative statics. In θ : rising surveillance lowers R , shrinking the concession region from one side. In l : falling leverage lowers $p \cdot D$, shrinking it from the other. AI raises θ and lowers l simultaneously — the paper's twin movement. Two corners follow. **Pacification corner** (θ high, l moderate): G offers the cheapest flow transfer that keeps M demobilised — revocable, recalibrated annually; this is UBI-as-quiescence, and it is an equilibrium, not a mistake. **Repression corner** (θ high, l low): even the flow transfer is unnecessary. The window claim of Section 17 is the observation that l is (on the thesis) monotonically falling, so any settlement requiring C to be paid must be extracted at current l — and stock concessions, once granted, move future bargaining inside the concession: shareholders cannot be starved out by budget cycle. The model is a frame for organising evidence, and is offered as nothing more.

Appendix B — Weimar: who actually voted for Hitler

Falter's synthesis (Hitlers Wähler, 1991; revised 2020) from ecological regression across the 1928–1933 elections: the NSDAP was a cross-class protest party with a middle-class bulge — overrepresented among Protestants, the self-employed, civil servants, farmers of the Protestant northeast, and students (roughly nine times their population share); underrepresented among Catholics and big-city industrial workers. The unemployed flowed disproportionately to the KPD. About forty per cent of workers voted NSDAP by 1932, but predominantly rural and small-firm workers outside union structures. King, Rosen, Tanner and Wagner's 2008 re-analysis concurs on the central point. The trajectory: 2.6 per cent (May 1928) to 43.2 (July 1932) — a five-year avalanche fed by fear of falling more than by having fallen. The reading this paper takes: displacement's political product is bimodal — radicalisation of the displaced toward movements that lack power precisely because their base lacks leverage, and authoritarian availability among the adjacent-threatened, who still have leverage and spend it on protection-by-exclusion.

Appendix C — Speenhamland: the autopsy of a cautionary tale

The tale (Polanyi, ch. 7–8, following the 1834 Poor Law Report): Berkshire magistrates, 1795, peg parish relief to bread prices as a wage top-up; employers cut wages knowing the parish pays the difference; productivity, wages, and self-respect spiral for forty years until the New Poor Law abolishes outdoor relief. The autopsy (Blaug 1963–64; Block and Somers 2003): the bread scale was adopted patchily, applied intermittently, and largely abandoned by the 1820s; no county-level evidence links allowances to lower wages or higher fertility; the distress of the “Speenhamland counties” traces to the collapse of cottage industry, wheat volatility, demobilisation after 1815, and the threshing machine — the same machine of Part IV; and the 1834 Report was substantially drafted before its questionnaires returned. Polanyi built the century's most influential warning against income support on the Report's numbers. The warning's economics is dead. Its politics — that relief without power marks a class that has lost its bargain — survives on independent evidence, which is why Part V retires the tale and keeps the moral.

Appendix D — The automation limit case

Condensed from the companion paper. In a task-based model, let automation extend over the task continuum. Labor's share $s_L \rightarrow 0$ as the automated fraction $\rightarrow 1$ for any elasticity of substitution, because the wage is paid only on the surviving tasks and the surviving measure vanishes. The popular inference — capital's share $\rightarrow 1$, capitalists inherit — ignores that reproducible capital in unbounded accumulation drives its own marginal product toward the reproduction cost. Rents concentrate on the non-reproducible inputs: land, energy, extractable matter, siting, spectrum, and state-created enclosures (IP, data rights, compute export controls). A Ricardian conclusion reached without a labor theory of value. Implication carried into Part V: the settlement instruments that matter in the limit are claims on the rent base — which is why Altman's proposal taxes land alongside market cap, and why “data and compute as commons” is scored as the least developed but ultimately central instrument.

References

- Acemoglu, D. (2019). Why universal basic income is a bad idea. *Project Syndicate*, June.
- Acemoglu, D. and J. A. Robinson (2000). Why did the West extend the franchise? Democracy, inequality and growth in historical perspective. *Quarterly Journal of Economics* 115(4).
- Agnolin, P., M. Anelli, I. Colantone and P. Stanig (2025). Robots replacing trade unions. IZA DP 17864.
- Alesina, A. and R. Perotti (1996). Income distribution, political instability, and investment. *European Economic Review* 40(6).
- Allen, R. C. (2009). Engels' pause: technical change, capital accumulation, and inequality in the British industrial revolution. *Explorations in Economic History* 46(4).
- Altman, S. (2021). Moore's law for everything. Blog essay, March.
- Anelli, M., I. Colantone and P. Stanig (2021). Individual vulnerability to industrial robot adoption increases support for the radical right. *PNAS* 118(47).
- Arendt, H. (1958). *The Human Condition*. Chicago.
- Aristotle. *Politics*, Book I, 1253b (tr. Jowett).
- Atkinson, A. B. (2015). *Inequality: What Can Be Done?* Harvard.
- Autor, D., D. Dorn, G. Hanson and K. Majlesi (2020). Importing political polarization? *American Economic Review* 110(10).
- Beraja, M., A. Kao, D. Y. Yang and N. Yuchtman (2023). AI-tocracy. *Quarterly Journal of Economics* 138(3).
- Beraja, M., D. Y. Yang and N. Yuchtman (2023). Data-intensive innovation and the state. *Review of Economic Studies* 90(4).
- Blaug, M. (1963). The myth of the old poor law and the making of the new. *Journal of Economic History* 23(2).
- Block, F. and M. Somers (2003). In the shadow of Speenhamland: social policy and the old poor law. *Politics & Society* 31(2).
- Bostrom, N. (2024). *Deep Utopia: Life and Meaning in a Solved World*. Ideapress.
- Burawoy, M. (2010). From Polanyi to Pollyanna: the false optimism of global labor studies. *Global Labour Journal* 1(2).
- Caprettini, B. and H.-J. Voth (2020). Rage against the machines: labor-saving technology and unrest in industrializing England. *AER: Insights* 2(3).
- Case, A. and A. Deaton (2020). *Deaths of Despair and the Future of Capitalism*. Princeton.
- Chenoweth, E. (2020). The future of nonviolent resistance. *Journal of Democracy* 31(3).
- Danaher, J. (2019). *Automation and Utopia*. Harvard.
- Darity, W. and D. Hamilton (2010). Can 'baby bonds' eliminate the racial wealth gap? *Review of Black Political Economy* 37.
- Engels, F. (1845). *The Condition of the Working Class in England*.
- Falter, J. W. (1991/2020). *Hitlers Wähler*. C. H. Beck.
- Ferejohn, J. and F. Rosenbluth (2017). *Forged Through Fire: War, Peace, and the Democratic Bargain*. Liveright.
- Frase, P. (2016). *Four Futures: Life After Capitalism*. Verso.
- Frey, C. B. (2019). *The Technology Trap*. Princeton.
- Frey, C. B., T. Berger and C. Chen (2018). Political machinery: did robots swing the 2016 US presidential election? *Oxford Review of Economic Policy* 34(3).
- Hegel, G. W. F. (1807). *Phenomenology of Spirit*, IV.A (lordship and bondage).
- Hejeebu, S. and D. McCloskey (1999). The reproving of Karl Polanyi. *Critical Review* 13(3–4).
- Hobsbawm, E. and G. Rudé (1969). *Captain Swing*. Lawrence & Wishart.
- Jahoda, M., P. Lazarsfeld and H. Zeisel (1933). *Marienthal: The Sociography of an Unemployed Community*.
- Jones, D. and I. Marinescu (2022). The labor market impacts of universal and permanent cash transfers. *AEJ: Policy* 14(2).
- Kalecki, M. (1943). Political aspects of full employment. *Political Quarterly* 14(4).
- Kendall-Taylor, A., E. Frantz and J. Wright (2020). The digital dictators. *Foreign Affairs* 99(2).
- Keynes, J. M. (1930). Economic possibilities for our grandchildren. In *Essays in Persuasion*.
- King, G., O. Rosen, M. Tanner and A. Wagner (2008). Ordinary economic voting behavior in the extraordinary election of Adolf Hitler. *Journal of Economic History* 68(4).
- Korpi, W. (1983). *The Democratic Class Struggle*. Routledge.

-
- Luebbert, G. (1991). *Liberalism, Fascism, or Social Democracy*. Oxford.
- Marx, K. (1858/1939). Fragment on machines. *Grundrisse*.
- Marx, K. (1867). *Capital*, vol. I, ch. 25.
- Meade, J. (1964). *Efficiency, Equality and the Ownership of Property*. Allen & Unwin.
- Mokyr, J., C. Vickers and N. Ziebarth (2015). The history of technological anxiety and the future of economic growth. *JEP* 29(3).
- Onorato, M., K. Scheve and D. Stasavage (2014). Technology and the era of the mass army. *Journal of Economic History* 74(2).
- Piketty, T. (2014). *Capital in the Twenty-First Century*. Harvard.
- Polanyi, K. (1944). *The Great Transformation*. Farrar & Rinehart.
- Scheidel, W. (2017). *The Great Leveler*. Princeton.
- Scheve, K. and D. Stasavage (2010). The conscription of wealth. *International Organization* 64(4); and (2016) *Taxing the Rich*. Princeton.
- Tilly, C. (1990). *Coercion, Capital, and European States*. Blackwell.
- Tocqueville, A. de (1840). *Democracy in America*, vol. II, part 4, ch. 6.
- Turchin, P. (2010). Political instability may be a contributor in the coming decade. *Nature* 463; and Turchin and Korotayev (2020), *PLOS ONE* 15(8).
- Vivalt, E., et al. (2024). The employment effects of a guaranteed income. NBER WP 32719.
- Weitzman, M. (1984). *The Share Economy*. Harvard.
- Womack, J. (2023). *Labor Power and Strategy*. PM Press.
- Wright, E. O. (2000). Working-class power, capitalist-class interests, and class compromise. *American Journal of Sociology* 105(4).
- Xu, X. (2021). To repress or to co-opt? Authoritarian control in the age of digital surveillance. *American Journal of Political Science* 65(2).
- de Bromhead, A., B. Eichengreen and K. O'Rourke (2013). Political extremism in the 1920s and 1930s. *Journal of Economic History* 73(2).