Firms' Inflation and Wage Expectations During the Inflation Surge

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Research Questions – Contributions

How did firms inflation expectations respond to the inflation cycle?

"A protracted phase of temporarily-high inflation runs the risk of affecting medium-term inflation dynamics through a re-setting of inflation expectations" Philip Lane (2022)

- Few firm surveys on inflation expectations (FRB Atlanta, Cleveland, ECB, BdI, Bundesbank)
- We rely on a large quarterly survey dataset covering the full inflation cycle (2020-2024)

What is the passthrough of expectations to firms' decisions?

- Expectation term in the Phillips curve and price setting models (Werning, 2022)
  - How large is the passthrough?
  - Which expectation horizon is the most relevant?
- Little direct evidence on the link between wage/price decisions of firms and their aggregate inflation expectations (Abberger et al. 2024, Buccheim et al. 2024,….)
- We relate - at the firm-level - inflation expectations and wage-price-employment decisions during the inflation cycle

Banque de France Inflation Expectation Survey

Conducted among 8,000 business leaders over the period 2020 Q4 – 2024 Q4
Additional quarterly module to a standard monthly business survey asking for firms' own economic situation and short-term forecasts (prices, employment, output,…)

4 questions on inflation and wage growth

"As a percentage, what is, to your knowledge, the current inflation rate in France?"
"As a percentage, what do you think will be the inflation rate in France in one year?"
"As a percentage, what do you think will be the inflation rate in France in 3 to 5 years?"
"As a percentage, what do you think will be the growth rate in base wages (gross, excluding bonuses) in your firm over the next 12 months?"

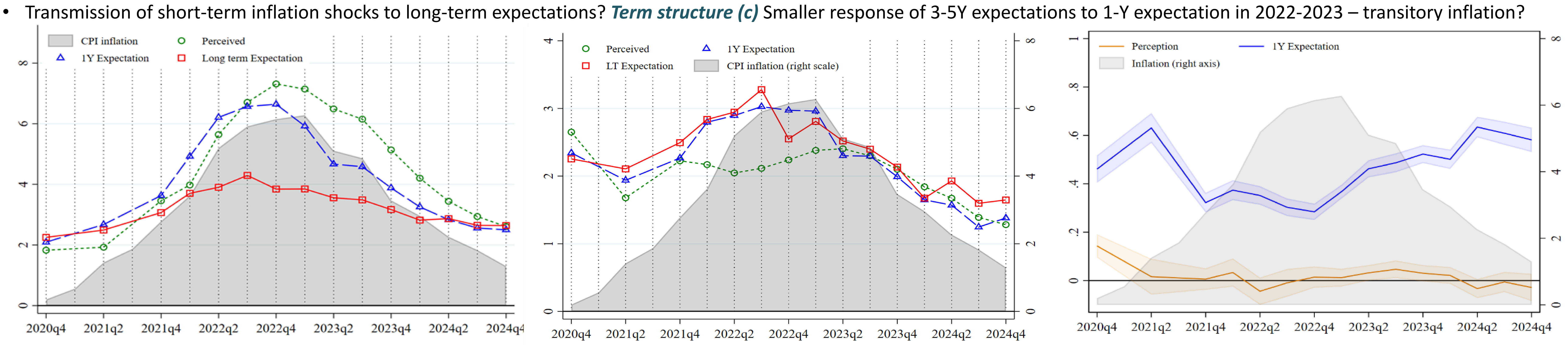
Main stylised facts on firms' inflation expectations (Savignac et al., 2024)

- *Small positive bias on inflation perceptions (+1 pp on average)*
- *Limited dispersion of inflation expectations (related to size, sector….)*
- *Small negative bias and very little dispersion for wage expectations*

Firms' Inflation Expectations Stay Broadly Anchored During the Inflation Cycle

3 criteria of inflation anchoring (Coibion and Gorodnichenko, 2025)

- Did expectations remain close to 2%? ***Level (a)*** Initial undershooting of expectations and overshooting after 2022Q2 (Angeletos et al., 2021); convergence to the target at the end of 2024
- Did firms disagree about inflation? ***Dispersion (b)*** Disagreement among firms was higher during the inflation surge then decreased steadily to reach a lowest at the end of 2024
- Transmission of short-term inflation shocks to long-term expectations? ***Term structure (c)*** Smaller response of 3-5Y expectations to 1-Y expectation in 2022-2023 – transitory inflation?



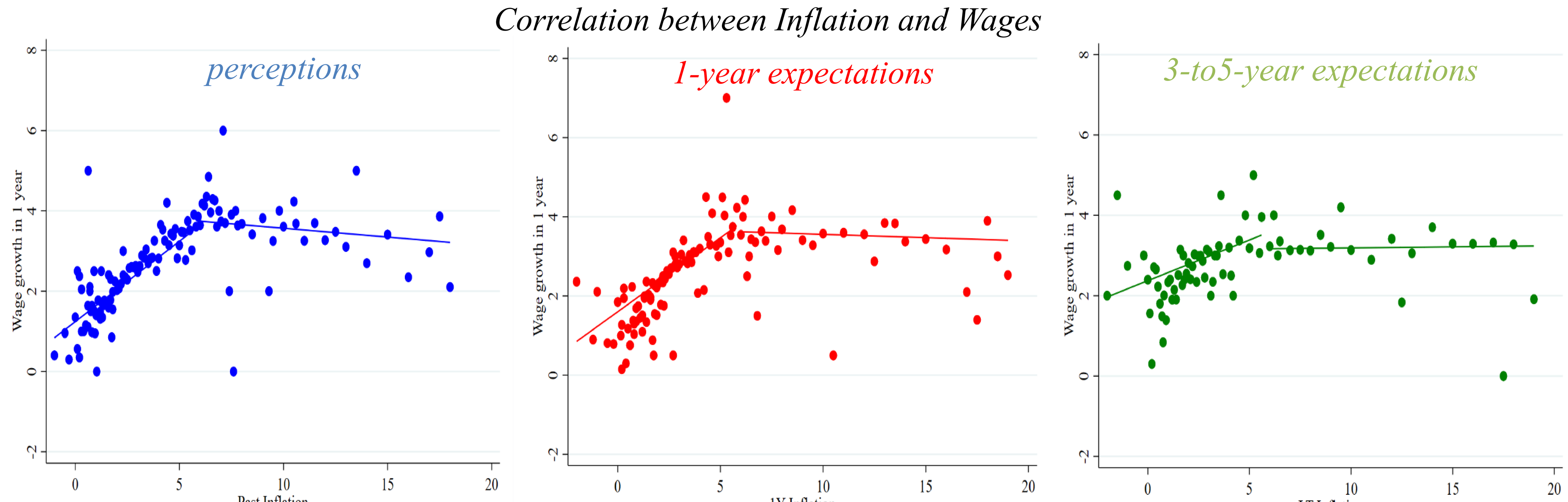
(a) Average inflation perception/expectations *(b) Standard deviation of inflation perceptions/expectations* *(c) Regression (by date) of LT exp. on 1-Y exp. and perceptions*

Inflation Expectations Do Matter for Firms' Decisions

- **1-year expectations (but not long term expectations)** are correlated with wage, price decisions (+) but also with employment, output (-)
- **Inflation perceptions play a significant role in wage setting** (some implicit indexation?)
- **Correlations are weaker when inflation is high** because firms with very high inflation expectations may not act on them

Passthrough of Inflation Expectations to Wages

Correlation between Inflation and Wages



$$E_t^i \Delta w_{t+12}^i = a + bE_t^i\pi_t + cE_t^i\pi_{t+12} + dE_t^i\pi_{LT} + \theta X^i + \varphi_t + \varepsilon_{i,t}$$

	(1)	(2)	(3)
Past inflation	0.190***	0.118***	0.054 ***
1-y expectation	0.076***	0.051***	0.043***
3-5-y expectation	-0.017**	-0.010	-0.001
R^2	0.161	0.181	0.207
Year fixed effects	No	Yes	No
Date fixed effects	No	No	Yes

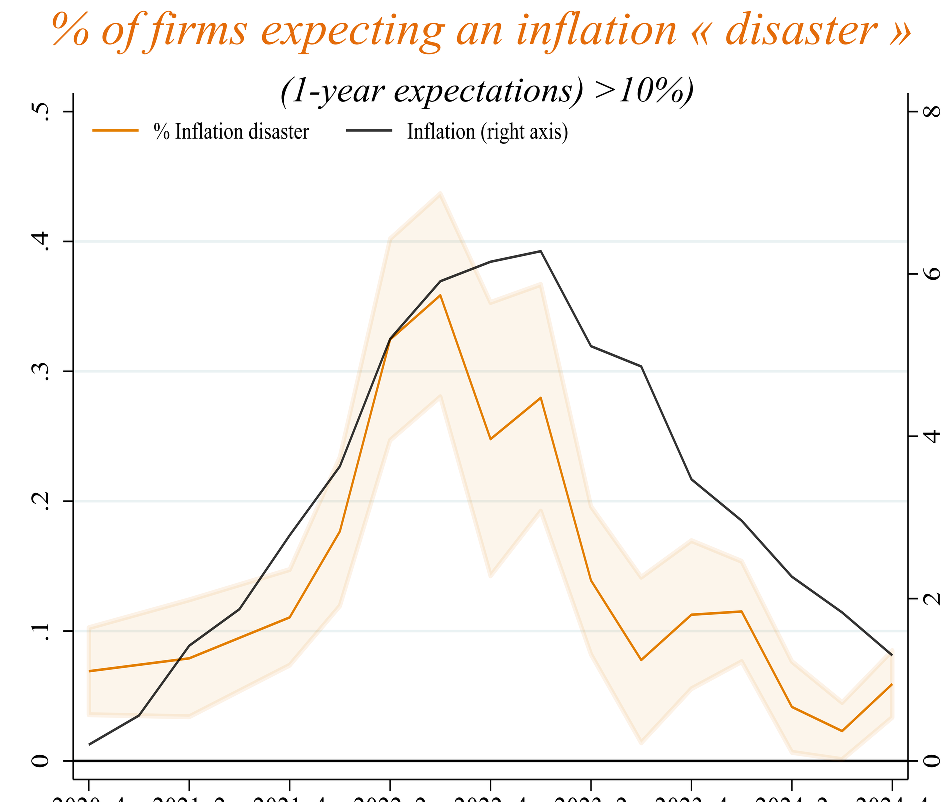
Note: Huber regressions, controls for firm characteristics (size, region, sector) & survey waves are included.

No stronger passthrough when inflation is high

	High inflation	Inflation "disaster"	High inflation excl. disasters
Past inflation	0.067***	0.063***	0.075***
1-y expectation	0.074**	0.086***	0.091***
3-5-y expectation	0.002	0.007	0.004
Interaction terms	$\pi_t > 4\%$	$E_{it}\pi_{t+1} > 10\%$	$\pi_t > 4\%$
Past inflation	-0.029*	-0.077***	-0.019
1-y expectation	-0.013	-0.130***	-0.005
3-5-y expectation	-0.010	-0.042***	0.004
R^2	0.206	0.210	0.220
Date fixed effects	Yes	Yes	Yes

Note: Huber regressions, controls for firm characteristics (size, region, sector) & survey wave are included.

% of firms expecting an inflation « disaster »
(1-year expectations) >10%)



- « High inflation » : period 2022 Q2 – 2023 Q3 (results robust to inflation>3% (2022Q1-2023Q4)
- 12% of firms on average expect inflation to be >10% , in particular smaller firms, construction sector, firms inattentive to inflation
- Similar conclusions are obtained for the passthrough of inflation expectations to prices

Passthrough to Prices & Employment

$$\sum_{h=0} \Delta x_{t+h,t+h-1}^i = \alpha_H + \delta_H E_t^i\pi_{t+12} + \omega_H E_t^i\pi_t + \gamma_{Ht} + \rho_H X_i + \varepsilon_{i,Ht}$$