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# TRÉSOR-ECONOMICS

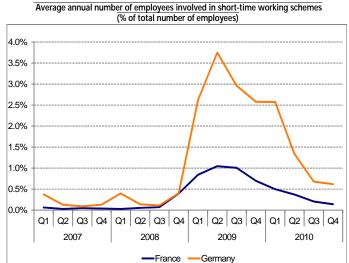
# Short-time working schemes in France and Germany: how do they differ?

- Large-scale use of short-time working (*Kurzarbeit*) is frequently advanced as an explanation of German jobs miracle («Jobwunder») during the crisis of 2008-2009. Germany succeeded in holding unemployment to 7.5%, a rise of just 0.2% between 2008 and 2009, whereas in France it rose by 1.6 points to 9.4% in 2009. This system concerned nearly 1.5 million salaried workers in Germany in 2009, as against 0.3 million employees covered by comparable schemes in France. The gross cost of these schemes is reckoned to be €10 billion in Germany, versus €1 billion in France, between 2007 and 2010.
- The difference in the extent of recourse to short-time working between France and Germany arises primarily from the context of the German crisis and the structure of industrial employment. During the crisis, Germany experienced a steep fall in external demand (-5.1% of German GDP in 2009, versus -2.7% in France), essentially affecting industry, a major user of short-time working. Moreover, pre-crisis corporate finances were strong, skilled labour was in short supply, and the share of industrial employment in total employment was larger than in France. Germany employers therefore had a greater incentive to retain labour in the prospect of a rapid upturn.
- The difference also arises from the complexity of the French scheme: the method of calculating benefits differs according to the size of the firm and the mechanism opted for (conventional or extended short-time working). This makes it hard for employers to predict the amount remaining to be paid by them. In Germany, the short-time working benefits (*Kurzarbeitergeld*) is consistent with conventional unemployment benefit rules, making the scheme more readily comprehensible. In France, the scheme would gain from greater legal security and from streamlining, to facilitate access to it in a downturn, for SMEs especially.
- Lastly, differences may also have their roots in Germany's tradition of regulated and negotiated flexible working time, combining a range of internal flexibility tools, including time savings accounts, and the ability to reduce or extend working time within certain limits (*Arbeitszeitkorridor*). Another factor is the country's highlydecentralised labour relation, facilitating the widespread use of the *Kurzarbeit* system.
- Neither country, however, makes much use of the period spent on short-time working to provide training for workers, perhaps due to the difficulty of coordinating periods of

short-time working - which are unpredictable - with training activities, which demand some planning. However, reforms in Germany (in 2009) and France (in 2012) are attempting to overcome these difficulties.

While *Kurzarbeit* appears to have made a major contribution to curbing unemployment in Germany during the crisis, it is still too early to assess its impact on maintaining jobs in the longer term. In France, there is a case to be made for a radical overhaul of public schemes to support short-time working.

Source: DARES, Bundesagentur für Arbeit, Eurostat, DG Trésor calculations.



This study was prepared under the authority of the Directorate General of the Treasury (DG Trésor) and does not necessarily reflect the position of the Ministry of Economy and Finance and Ministry of Foreign Trade

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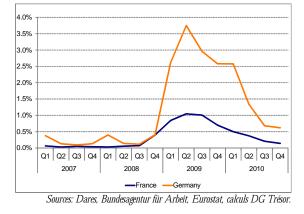
1. Germany made an extended use of short-time working during the recent recession, France much less so

1.1 Germany ramped up its system more significantly with the onset of the crisis

Short-time working is intended to cushion the impact of a downturn in activity on employees' remuneration, by shifting part of the cost of the replacement income onto the public purse. This strategy allows companies to preserve their work force instead of laying off employees.

Both Germany and France adapted their systems during the 2008-2009 recession. Germany in particular eased its eligibility conditions, extended the maximum period over which benefits were paid, and reduced the cost to the employer. France created a new extended short-time working scheme (*activité partielle de longue durée, APLD*) in 2009 designed essentially to improve benefits for the employees and completing its "conventional" short-time working system, which had

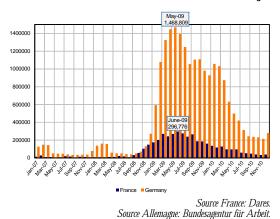
Chart 1: nombre annuel moyen de salariés participant à un dispositif de chômage partiel (en % du nombre total de salariés)



fallen into disuse. Moreover, the APLD scheme entails new legal obligations for the employer, including signature of a contract with the State, commitment to maintain employees in work (for a period at least equal to double the length of the extended scheme), and organising individual interviews to examine training opportunities.

These reforms were intended to make facilitate recourse to short-time working more attractive, so as to help ailing companies withstand the cyclical downturn. As a result, the proportion of employees concerned by them increased sharply in both countries between 2007 and 2009, although the rise was greater in Germany (Chart 1), and the number of employees concerned was five times greater at the height of the crisis (Chart 2).

Chart 2: nombre de salariés en chômage partiel en France et en Allemagne



### Box 1: Short-time working schemes in Europe

24 OECD countries, including most European countries, now have short-time working (STW) schemes in place, either reactivated or introduced during the crisis. These have been most widely used in Belgium, Turkey, Italy, Germany and Japan, where between 3 and 6% of employees were partially unemployed in 2009.

There are substantial differences between countries, chiefly:

### Eligibility requirements:

- No minimum work-time reduction required (e.g. France, Belgium, Italy, Japan), 10% threshold in Germany up to 40% (e.g. Norway, Denmark, Ireland);
- No fixed maximum work-time reduction (e.g. France for "total short-time working", Germany, Italy, Japan) but a maximum work-time reduction of 50% (Netherlands, Luxembourg);
- Austria and Hungary set financial criteria for employers, while the Netherlands merely makes loans to employers, but does not subsidise them.
- · Legal obligations associated with public aid:
  - · Compulsory training: e.g. Portugal, Netherlands, Hungary;
  - · Compulsory recovery plans: e.g. Italy, Spain;
  - Dismissal prohibited by law: e.g. Austria, Hungary, Netherlands, Poland, France extended short-time working (APLD).
- Generosity:
  - Full cost borne by government (i.e. no cost to employer for hours not worked): e.g. Belgium, Canada, Denmark, Finland, Spain;
  - Full wages paid for an initial period: Norway, Switzerland;
  - Partial or total exemption from social insurance contributions on hours not worked: e.g. France, Germany;
  - Unemployment benefit replacement rate: alignment with conventional unemployment insurance system (e.g. Germany, Denmark, Spain, Norway); short-time working benefits exceed unemployment benefit in most countries (excluding Portugal);
  - Maximum duration of benefits: extension of the quota of hours per employee (e.g. France, Belgium, Japan); extension of maximum duration during the crisis (Germany, Italy, Austria, Switzerland, Turkey); unlimited duration in Finland.

Source: Hijzen and Venn (2011), "The Role of Short-Time Work Schemes during the 2008-09 Recession", OECD Social Employment and Migration Working Papers, No. 1154.



1.2 The average duration of a short-time working episode is reckoned to be twice as long for German workers as for French ones

German workers who experience short-time working do so for 5 months on average. However, for two thirds of these workers, the short-time working episode probably does not exceed 4 months<sup>1</sup>. In France, the average duration of a shorttime working spell is less than 8 weeks<sup>2</sup>, bearing in mind that employers used the mechanism for an average of 4.5 months (6 months in industry) between 2007 and 2010. The legal maximum duration of recourse to short-time working may partly account for this difference (up to 24 months in Germany in 2009, compared with a maximum of 12 months in France).

1.3 After the height of the crisis, short-time working continues to be more widespread in Germany than in France, especially in small companies

Both countries were still making distinctly greater use of short-time working at the end of 2010 than before the crisis, Germany especially, where recourse to the scheme receded more slowly than in France. At the beginning of 2010, Germany still had more than a million workers on short-time work, versus fewer than 135,000 in France (see Chart 2). quarter of 2009. In France, short-time working is particularly widely used among large companies (see Chart 4).

Initial findings suggest that extended short-time working increased in Germany after the crisis (see Chart 3). Even if the number of workers on short-time working has fallen since its peak in 2009, there has been a rise in the share of workers who have experienced a drop in their number of hours worked over a long period. In autumn 2010, around 60% of workers on short-time working had been in that situation for more than a year. This increase in extended short-time working is particularly noticeable in industry, especially in engineering, metal construction, car manufacturing and the manufacture of electrical and electronic components.

1.4 The total cost of the public scheme was nearly nine times greater in Germany, between 2007 and 2010

Taking into account direct expenditures (short-time working benefits financed by the State and the "Unédic"<sup>3</sup> in France and by the German unemployment insurance scheme) and indirect expenditures (exemptions from social insurance contributions on short-time working benefits), the impact of short-time working on the public finances came to €9.5 billion in Germany and €1.1 billion in France, between 2007 and 2010<sup>4</sup>.

Table 1: Number of workers on short-time work (index 100 at crisis peak)

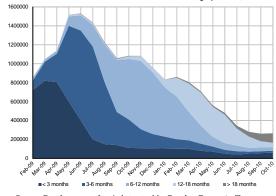
	August 2008	Peak (Q2 2009)*	January 2010	December 2010		
France	2	100	46	13		
Germany	2	100	72	19		

\* The number of workers on short-time work in France peaked in June 2009, and in May 2009 in Germany.

Sources: Dares, Bundesagentur für Arbeit, DG Trésor calculations. In Germany, the use of short-time working has progressively concentrated on small companies, whereas it remains concentrated in large firms in France. At the beginning of 2011, one worker in three on short-time working was working in a small business in Germany, compared with just one out of ten in the second

Short-time working expenditure authorisations by size of enterprise

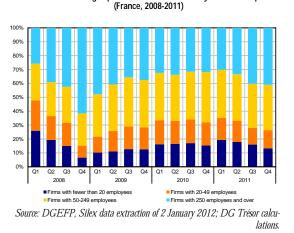
Chart 3: Number of workers on short-time working in Germany, by duration of short-time working episode (2009-2010)

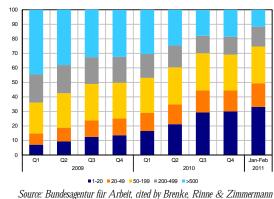


Source: Bundesagentur für Arbeit, cited by Brenke, Rinne & Zimmermann (2011).

Chart 4: Breakdown by size of enterprise (France: expenditure authorisations 2008-2011; Germany: number of workers concerned 2009-2011)

Number of workers on short-time working by size of enterprise (Germany, 2009-2011)





ource: Bundesagentur für Arbeit, cited by Brenke, Rinne & Zimmermann (2011).



Source: IAB-Kurzbericht 15/2011. This study covers only the region of Nuremberg, but it is the only, to our knowledge, to estimate the average duration of a short-time working episode in Germany.

<sup>(2)</sup> Source: Odile Chagny (2010), "From Partial Unemployment to Partial Activity: The Story of a Very Typical French Lady", Mutual Learning Programme, Host Country *Discussion Paper* - France (Peer Reviews).

<sup>(3)</sup> French unemployment insurance scheme administered jointly by elected employer/employee representatives.

<sup>(4)</sup> Source: Chagny and Rémond (2012), updated by Chagny (2010).

### Table 2: Impact of short-time working schemes on public finances in France and Germany

	FRA	NCE	GERMANY		
2009	€670 M		€4,600 M		
	Allocations €360 M (State: 320 ; Unédic: 40)	Social ins. contributions forgone €310 M	Allocations €3,000 M	Social ins. contributions forgone €1,600 M	
2010	€11	0 M	€3 100 M		
	Allocations €325 M (State: 280 ; Unédic: 45)	Social ins. contributions forgone €85 M	Allocations €1,700 M	Social ins. contributions forgone €1,400 M	

Sources: DARES, German Federal Employment Agency, France State Audit Office, DG Trésor calculations.

Note: The 2011 Annual Report of the French Government Audit Office suggests a figure of 66 billion for the total cost to German public finances in 2009. However, we have used the most recently updated figure published by the German Federal Employment Agency (64.6 billion).

### 2. There are nevertheless certain points in common between the two countries

# 2.1 During the crisis, short-time working was concentrated in industry, and was more widely used in large companies

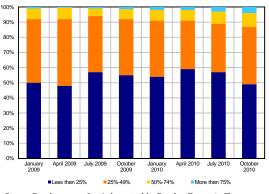
Firms with more than 500 employees made abundant use of short-time working (one company in five in Germany during the crisis<sup>5</sup>, and they accounted for more than a third of short-time working hours in France in the period 2007-2010). In Germany, industry accounted for three quarter of workers on short-time working in 2009, chiefly in the metalworking industries (223,000 out of the 1.2 million workers concerned in 2009), in mechanical engineering (191,000), and in car manufacturing (165,000)<sup>6</sup>. In France, industry accounted for 84% of short-time working hours, chiefly car manufacturing (27% of hours between 2007 and 2010).

2.2 The average reduction in hours worked per worker is similar

**This represents around a third of hours worked.** In Germany, this reduction held steady throughout the crisis, at around 30%. For one worker in two, it amounted to a quarter, and to more than half for one worker in ten (see Chart 5). In France, workers on short-time working in 2009 experienced

an average reduction of 12 hours in their weekly working hours, or roughly a third of their working hours<sup>7</sup>. The average monthly reduction over the period 2007-2010 was smaller, being around 30 hours (or 40 hours in firms with under 20 employees).

Chart 5: Breakdown of workers on short-time working in Germany, according to working time reduction



Source: Bundesagentur für Arbeit, cited by Brenke, Rinne & Zimmermann.

3. Cyclical, structural and institutional factors can account for the difference between the two countries in their intensity of recourse to short-time working

3.1 The cyclical demand shock was sharper in Germany, where the industrial sector accounts for a larger share of the economy

The cyclical shock was far more pronounced in Germany than in France in the course of 2009. German GDP fell by 5.1%, versus 2.7% for France. At the same time, unemployment barely rose in Germany, edging up from 7.5% in 2008 to 7.8% in 2009 (+0.3%), whereas French unemployment rose from 7.8% to 9.5% (+1.7%) over the same period<sup>8</sup>.

The export sectors were the first to be hit by recession, and hence industry, the largest user of short-time working during the crisis. It so happens that Germany's industrial sector is larger than in France, with industry accounting for 22% of total salaried employment, versus 14% in France<sup>9</sup>.

## 3.2 German firms were in better financial shape before the crisis, and demand for skilled labour was greater

The strong financial health of German firms, which they had built up during the period of robust growth prior to the crisis, and the relative scarcity of skilled labour before the crisis, especially in the most heavily exporting sectors, all contributed to the retention of labour despite the downturn in activity (Ziemann, 2010). Companies preferred to hold onto their workers so as not to be unable to meet demand once the recovery set in<sup>10</sup>. Heavy investment in continuing training, which is greater in Germany, also contributed to this. These bottlenecks can be expected to go on tightening in the longer term due to Germany's low fertility rate (Bosch, 2010; Möller, 2010).

<sup>(10)</sup> Bosch (2010) considers that dismissing a million workers during the crisis and then re-hiring a corresponding number of workers after the crisis would have cost firms  $\in$ 44 billion altogether, which compares with the  $\in$ 5 billion that short-time working would have cost them, according to certain estimates (Bach and Spitznagel, 2009).



<sup>(5)</sup> Source: Brenke K., U. Rinneet K.F., Zimmermann (2011), "Short-Time Work: The German Answer to the Great Recession", IZA *Discussion Paper*, No. 5790, June.

<sup>(6)</sup> Source: Department of Economic Relations, French Embassy in Berlin.

<sup>(7)</sup> Source: Odile Chagny (2010), "From Short-time working to Partial Activity: The Story of a Very Typical French Lady", Mutual Learning Programme, Host Country *Discussion Paper* - France (Peer Reviews).

<sup>(8)</sup> Source: Eurostat.

<sup>(9)</sup> Source: Eurostat. In 2007, manufacturing industry employed 3.6 million people in France, compared with 7.2 million in Germany, i.e. exactly 50%.

### Box 2: What does economic theory say about the use of short-time working?

The economic literature ascribes two roles to short-time working as an instrument of flexibility (internal flexibility under the 1995 OECD classification) and as a mechanism for protecting jobs. These two aims exist side by side, since the temporary decline in hours worked helps to protect jobs.

There are three economic arguments justifying recourse to short-time working, namely labour market segmentation, the theory of implicit contracts, and the concept of flexicurity.

- Labour market segmentation: short-time working may be seen as a mechanism allowing firms in trouble to retain employees with the highest and least transferable skills and qualifications on their payroll. Companies that spend more on training have an even greater incentive to hold onto their highly-trained workers in times of temporary economic difficulty (Abraham and Houseman, 1994);
- Implicit contracts (Azariadis,1975): this argument considers how the unemployment insurance system acts as an incentive to lay off workers rather than reduce working time (including short-time working). Workers and employers are engaged in a bilateral negotiation in search of a solution that works for both parties and optimal depending on the choice of the other party. In that case, short-time working can be seen as a solution allowing employers to retain a contractual link with their employees over an extended period of time and to share cyclical risks (Rosen, 1985);
- With the **concept of flexicurity**, short-time working can at last be treated as a form of flexicurity, insofar as it gives employers the flexibility they need to cope with specific variations in their activity while providing their employees with security.

Source: Calavrezo (2010), "Entre flexibilité et sécurité: l'accompagnement des entreprises et des mobilités professionnelles. Essais empiriques de microéconométrie du marché du travail" (Between flexibility and security: supporting companies and career mobility. Empirical microeconometric labour market studies), Doctoral thesis (Chapter 1, section 2) p.41.

### 3.3 The French system's complexity might explain its lack of appeal

There are two main STW schemes in France, namely: partial unemployment "*chômage partiel*" and extended short-time working (APLD), which was introduced in 2009 in response to the crisis. The French system is unclear because based on a variable flat-rate subsidy<sup>11</sup> that depends on the system used, the size of the firm and the work-time regulations contained in the employee's work contract. This contrasts with the easy-tounderstand German approach, based on the conventional system of unemployment benefit, representing 60% or 67% of the reference wage.

By way of illustration, table 3 presents a handful of typical cases of the residual amount to be paid by the employer. Depending on the case, either the State may pay the employee's benefit in full, or the employer may even be required to cover three-quarters of the benefit. The cost of the benefit legally to be paid by the employer ("the out of pocket") appears to be higher in France. However, this comparison excludes residual costs and additional payments to be made under collective agreements, which can be relatively high in Germany and have not been assessed in France<sup>1</sup> From a legal standpoint, since 2009 Germany employers are required to pay only a portion of the employer's share of social insurance contributions (14.4%) for the first six months of short-time working. All social insurance contributions are waived if the employee undergoes training, and starting from the 7th month (even without training). In France, despite full exemption from social insurance contributions, French employers are still required to pay a larger residual charge than their German counterparts, with the sole exception of employees on close to the national minimum wage (see Chart 6). Recent reforms in France tend to reduce this cost to the employer.

		1 "Smic"		1.5 x "Smic"		2 x "Smic"		3 x "Smic"	
		€h	%	€h	%	€h	%	€h	%
Conventional short-time working	Employees <= 250	3.0	54%	4.5	54%	7.2	65%	12.8	61%
« chômage partiel »	Employees > 250	3.5	63%	5.0	60%	7.7	<b>70%</b>	13.3	64%
Extended short-time working	Employees <= 250	1.2	17%	4.6	45%	8.1	<b>58</b> %	15.0	72%
(APLD) < 50h	Employees > 250	1.7	24%	5.1	50%	8.6	62%	15.5	75%
Extended short-time working	Employees <= 250	-0.8	-12%	2.6	25%	6.1	44%	13.0	63%
(APLD) > 50h	Employees > 250	-0.3	-5%	3.1	30%	6.6	48%	13.5	65%

Table 3: The "out of pocket" to the French employer per hour not worked, to March 2012 (in ∉hours not worked and in% of short-time working benefit paid to employees)

Interpretation: In a firm with fewer than 250 employees and no collective extended short-time working agreement, each hour not worked costs the employee  $\pounds$  3.00 for an employee earning the national minimum wage (Smic). In that case, the employer contributes 54% of the benefit paid to the employee, the remainder being covered by the State.

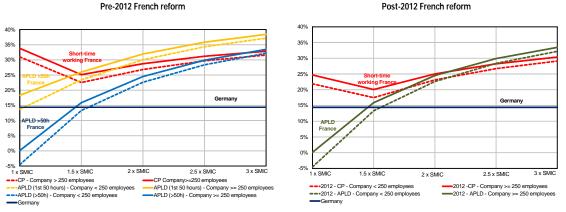
Sources: DGEFP, DG Trésor.



<sup>(11)</sup> The 28 February 2012 Decree increased the conventional hourly short-time working benefit paid for by the State by one euro, from the previous figure of €3.84 to €4.84, for companies with between 1 and 250 employees; for companies with more than 250 employees, the figure was increased from €3.33 to €4.33. The hourly benefit for extended short-time working is currently €7.74 in firms employing between 1 and 250 people, and €7.23 in those employing over 250, of which €2.90 per hour is financed by the Unédic (that previously intervened only after the 51st hour of STW).

<sup>(12)</sup> The Institut für Arbeitsmarkt- und Berufsforschung (IAB) has estimated the residual costs (Remanenzkosten) borne by German employers at between 24% and 35%. There is no equivalent estimate available for France. Concerning additional payments under collective agreements in Germany, in the metalworking and chemical industries, for example, an agreement has been signed capping the benefit at 90% of the previous net wage (Bosch, 2010), bringing the level of German benefits up to the level of France's extended short-term working scheme. Similar residual costs (including incentive and profit-sharing schemes, supplementary company retirement plans, etc.) or additional payments under collective agreements (e.g. Renault's Contrat social de crise, crisis-period labour deal) are also to be found in France, where the employer may go beyond legal and collectively agreed thresholds, but these cases have not been included in the assessment. In the absence of evidence permitting a substantive comparison on these points, the comparison made in this study is confined to legally-required benefits only.

Chart 6: Charge to be paid by the employer per hour not worked, in France and Germany, excluding residual costs and collectively agreed additional payments (as% of cost per hour worked)



Note: For France, unbroken lines show the remaining portion to be paid by companies employing more than 250 people, while dotted lines show the remaining portion to be paid by companies with 250 or fewer. Interpretation: In a company with more than 250 employees and no collective extended short-time working agreement, the employer bears 34% of the cost per

Interpretation: In a company with more than 250 employees and no collective extended short-time working agreement, the employer bears 34% of the cost per hour worked for an employee on the SMIC minimum wage (one unworked hour costs of 34% of the cost of an hour worked). In Germany, the residual cost to employers is 14.4% (excluding collectively agreed non-wage or other benefits) and does not rise with wages.

Under the French procedure, until March 2012 an administrative authorisation was required before workers could be placed on short-time working. Although abolished recently, this requirement is to be restored shortly, as called for in a report by the Inspectorate of Social Affairs (IGAS), mainly for the sake of legal security<sup>13</sup>.

Presumably, employer obligations associated with short-time working in France, which include the commitment to keep the employee in work for double the length of the agreement and an individual training interview in the case of extended shorttime working, explain why extended short-time working agreements account for only 10% of applications to introduce short-time working. Yet the Labour and Employment Ministry does not monitor centrally employers' obligations<sup>1</sup> . In Germany, the employer is under no obligation provided he is eligible for the scheme. Guarantees to keep employees in work and the training procedures are supposed to be negotiated as part of the collective bargaining agreement, which must be signed in order to qualify for public financing. Indeed in Germany all employers' commitments vis-à-vis employees (training, keeping employees in work into the medium-term, wage top-up payments additional to the short-time working benefit) flow from that country's decentralised labour-management dialogue and take the company's economic situation into account, as part of Germany's tradition of co-determination

### 3.4 Internal flexibility instruments are more highly developed in Germany

Internal flexibility is deeply rooted in German culture, and there are a variety of tools for achieving this (time savings accounts, which are more widespread than in France<sup>16</sup>, with the use of collectively negotiated *Arbeitszeitkorridor*<sup>17</sup>, *Kurzarbeit*, etc.). As a result, German firms have initially utilised a set of internal flexibility instruments before resorting to short-time working, especially since they are required by law to use up time savings accounts and to bring forward holidays before entering into any agreement regarding the use of short-time working. Consequently, shorttime working accounts for just over a quarter of the 3.3% drop in the number of hours worked per capita in Germany between 2008 and 2009 (see Chart 7)<sup>18</sup>. The remainder corresponds to other working time reduction measures, in comparable proportions, i.e. temporary working time reductions covered by agreements (e.g. "working time corridors", jobs-preservation agreements, etc.), reduced overtime, and running down time savings accounts<sup>19</sup>.

Other institutional arrangements too shape recourse to shorttime working, such as employment protection legislation, and the degree to which collective negotiations are centralised (Boeri & Bruecker, 2011). On the one hand, the stronger the employment protection legislation (EPL), which is more the case in Germany than in France as regards permanent jobs ("CDI" in France), the higher the cost of dismissal, providing an incentive to maintain these employees in their jobs.

<sup>(19)</sup> The reduced overtime mechanism has played an important role, insofar as, in Germany, overtime is either paid or additional hours are credited to the time savings account.



<sup>(13)</sup> IGAS (2012), "Évaluation du système français d'activité partielle dans la perspective d'une simplification de son circuit administratif et financier" (Evaluation of the French short-time working system with a view to streamlining the scheme from an administrative and financial point of view), IGAS Report no. 2012-31RM2012-084P, June 2012.

<sup>(14)</sup> Source: Cour des comptes (Government Audit Office) (2011).

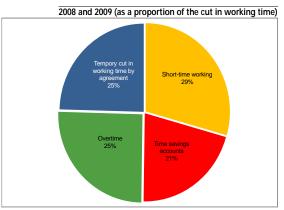
<sup>(15)</sup> Under German law, the *Betriebsvereinbarung* (works agreement) covers a very broad range of powers: the company's internal rules and procedures are codetermined, approval of the works council is required for working hours, recourse to overtime and to short-time working, and, in a number of cases defined by law, it can oppose both hirings and (although this is not a veto mechanism) dismissals, etc.

<sup>(16)</sup> In 2010, 51% of employees had access to a time savings account in Germany, versus 12% in France.

<sup>(17)</sup> Arbeitszeitkarridoren, or "working time corridors" refer to minimum (floor) and maximum (ceiling) limits within which employees' working time may be adjusted to match activity levels. They must determined under a collective agreement, signed either at branch level or within a specific company. They serve to modulate normal working time between the floor and ceiling thus defined, thereby avoiding costly recourse to overtime and short-time working.

<sup>(18)</sup> Other evaluations have been made of the impact of short-time working on the volume of hours worked (notably by the OECD), but here we have used the updated figures provided by the IAB.

Moreover, the more decentralised the collective negotiations, as in Germany (with its emphasis on negotiation at company level) but not in France, the easier the recourse to *Kurzarbeit*. Traditionally, France has shown a preference for external flexibility. There has been little adjustment in working time to the crisis  $(-0.4\%)^{20}$ . There has been less recourse to internal flexibility instruments, the main instrument used being annual working time adjustments. Similarly, although wage growth slowed, it remained positive in France during the crisis, whereas wages have contracted in Germany as a result of wage concessions agreed in exchange for preserving jobs<sup>21</sup>. Consequently, wages have not compensated for the weak adjustment in permanent employment, resulting in a sharp deterioration in profit margins during the crisis, with most of the adjustment taking place via the volume of atypical casual (or "precarious") jobs (e.g. temporary work, fixed-term contracts, etc.).



Source: DG Trésor (updated by Ziemann (2010) based on IAB figures, http://doku.iab.de/grauepap/2012/tab-az11.pdf).

Chart 7: Chart 7: Average reduction in working time in Germany between

### Box 3: Internal and external flexibility mechanisms

Atkinson (1984) differentiates between internal and external flexibility.

- Internal flexibility refers to a collection of strategies for adjusting the workforce to variations in demand without recourse to the external labour market. Adjustment may take place via working hours (numerical flexibility), incomes (monetary flexibility), or via the organisation of work and qualifications (functional flexibility).
- External flexibility depends primarily in adjustments to the number of employees (through hiring and dismissals), but also, and increasingly, it depends on recourse to fixed-term or temporary employment, and on "transfer" companies.

Forms of flexibility	Quantitative flexibility	Quantitative flexibility			
External flexibility	Type of employment contract:   • Permanent contracts   • Fixed-term contrats   • Temporary contrats   • Seasonal work   • Working on call	Form of production: • Subcontracting • Outsourcing • Self-employment			
Internal flexibility	Working time:   • Working time reduction   • Overtime /Short-time working   • Night work /Shift work   • Compressed workweek schedules   • Variable working hours   • Irregular / unpredictable working hours	Work organisation:   Job enrichment/ job rotation   Shift work /autonomous working   Multitask duties /labour versatility   Project groups   Workers have responsibilities for planning, budgeting, technological innovation			

The OECD (1995), on the other hand, distinguishes between three categories of flexibility: external quantitative flexibility (fixed-term contracts and temporary work), internal quantitative flexibility (overtime, working time reduction mechanisms such as adjustment or calculating working time over a full year), and external qualitative flexibility (labour versatility). While Germany makes greater use of internal flexibility through working time reductions and pay, France deploys a mix of the two strategies (internal and external), as does Italy. Other countries, such as Spain and the United States, adjust even more extensively through cuts in the number of jobs (external flexibility). Japan, meanwhile, has adjusted more via cuts in hourly wages.



<sup>(20)</sup> Source: OECD (2010).

<sup>(21)</sup> For France, the rise in wages at current prices was certainly moderate in 2009, but since inflation had abated very sharply over the same period, the trend in real remunerations (at constant prices) was finally more favourable in 2009 than in 2008: +1.1% for the real average per capita wage, coming after +0.2% the previous year (source: Insee). For Germany, the average per capita wage slipped 0.3% in 2009, despite a 3.2% rise in the hourly wage that year. The real average per capita wage too fell by 0.5%, having fallen 2.7% since 2002 (source: Ziemann, 2010).

### 4. Is short-time working, which started out as a crisis response, becoming a permanent fixture?

Short-time working allows companies to ramp up production rapidly in the wake of a cyclical crisis, while avoiding costly dismissal, recruitment and training procedures. However, if the crisis reflects structural changes in the economy, shorttime working may encourage excessive labour hoarding and delay the necessary adjustments to a changing economic environment. It looks as though this effect has been limited in Germany, since the economic picked up vigorously as early as 2010.

The fact that the system remains in wider use than before the crisis could, however, signal that some companies may be using short-time working as a means to put off inevitable redundancies in sectors that are no longer sufficiently competitive (a displacement effect)<sup>22</sup>, or as a means to go on receiving public aid for jobs they would have preserved even in the absence of the aid (a windfall effect). Preserving jobs in sectors in structural decline may, moreover, delay the reallocation of labour and thus impede the return to growth.

It is still too early to assess whether recourse to short-time working has benefited Germany overall, especially as regards its longer-term impact on growth and jobs. So far, the gains in terms of falling unemployment and the capacity of firms to keep their labour force intact are plain to see. Since its recovery, Germany has confirmed its preference for Kurzarbeit, adapted to cyclical conditions. The pre-crisis eligibility criteria were eased during the crisis, but they have now been restored, with a maximum duration for the scheme's use of 6 months in 2012, compared with 24 months in 2009. However, after the severe wage restraint seen in Germany since the early-2000s -a major concession by employers and which facilitated recourse to Kurzarbeit during the crisis- the most recent annual wage round at the start of 2012 brought demands for higher wages, and the idea of a minimum wage has been mooted. A return to faster wage growth would indeed bolster consumption and facilitate a narrowing of the competitiveness gaps within the euro zone. The debate in France, where the crisis persists, is focusing on striking a better balance between internal and external flexibility instruments, combining increased recourse to the shorttime working scheme with greater adaptability to the business cycle, while enhancing the system's security for employers and

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<sup>(22)</sup> In their study of the French experience between 1995 and 2005, Calavrezo et al. (2009) show that short-time working tends to be a harbinger of dismissals and the demise of companies, not a means to avoid them.