

Active Labour Market Policy A Failure?

The ZEW has conducted an aggregate impact analysis of active labour market policy on regional unemployment in East and West Germany. The investigation shows that traditional instruments of labour market policy such as job creation schemes and public training programmes for the unemployed supported by the public employment service, instead of contributing to a reduction in the number of unemployed, actually may raise registered unemployment in the long term.



Unemployed in active labour market policy programmes.

■ The ZEW estimated the effects of various measures of active labour market policy on the outflows from as well as the inflows into registered unemployment to calculate the net effect on the level of unemployment.

The investigation shows that job creation schemes may raise the level of registered unemployment. This occurs because the schemes reduce the number of persons leaving the stock of unemployment and, at the same time, increase the number of persons entering the unemployment pool. One of the reasons for this result is that most people re-enter the unemployment pool directly after termination of the job creation scheme. Presumably, they search less intensively for regular employment while participating in the scheme. Besides, the employment opportunities of non-participants

are indirectly influenced by extensive labour market policy measures, for example by the substitution of unsubsidized by subsidized jobs.

The expansion of public training programmes in East and West Germany also raised registered unemployment. This negative employment effect was particularly strong in the first half of the nineties. On the one hand, these public training schemes have only a slight effect on the outflows from unemployment. The negative effect obtained for the beginning of the nineties is explained by the fact that, at least in the new Federal States, the infrastructure for training measures was underdeveloped in the first two years after re-unification. On the other hand, training schemes also led to an increase in the inflows in registered unemployment, especially in the first half of the nineties. This

increase can be attributed to two factors. Firstly, during the training course participants hardly search for jobs. That this effect was less pronounced in the second half of the nineties may be explained by a change in regulations because since 1998 participation in training schemes – as opposed to job creation schemes – does not lead to renewed claims for unemployment benefits. This may have contributed to more intensive job search of participants in public training programmes. A second possibility is that an increasing share of people formerly out-of-the-labour-force have been registering as unemployed as a precondition to participate in training courses.

The aggregate impact analysis supports the results of earlier studies for Germany which show that public job creation

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Research Findings

and training schemes hardly had any positive effects on employment. For East Germany, the ZEW-study suggests that the slight positive effects for participants in public training schemes measured at the microeconomic level were outweighed by negative indirect effects.

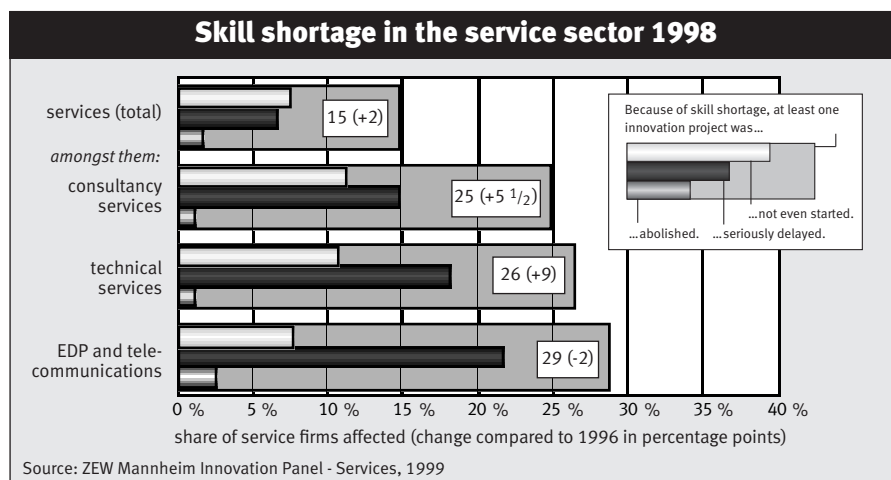
However, as data availability in Germany currently allows to estimate only average effects of various measures, an overall assessment of the effectiveness of active labour market policy would be premature. In particular, the training schemes may be expected to reveal positive ef-

fects with regard to certain courses. In order to identify these measures and obtain clues for a more effective design of active labour market policy, it would be necessary that the Federal Labour Office allows access to more detailed data. ◀

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Skill Shortage Slows Down Innovations

In Germany, there is a strong demand for highly qualified labour. For one out of seven service firms the shortage of adequately skilled staff hampers innovative activities. Consequently, the introduction of new services, products or production processes is being seriously delayed or even prevented, which in turn considerably affects competitiveness. This is the result of the ZEW's recent innovation survey in the service sector.



■ The shortage of skilled labour is felt not only in firms working in the IT service and Software sector. In fact, in the past two years the problem of skill shortage has also sharply increased in the innovative sectors of technical services as well as in consultancy services. These are the results of the innovation survey in the service sector, which the ZEW conducts, on behalf of the Federal Ministry for Education and Research, every year among approximately 2,500 companies in this sector. According to the study, projects often are not even started due to skill shortage. And even if a project is launched its term is often seriously delayed for want of qualified employees. As adequately qualified staff cannot be hired on the German labour market, in-

novation projects fail even if firms have sufficient financial resources.

The service providers affected by the shortage of skilled personnel are primarily seeking computer scientists or highly qualified professionals from other EDP-related occupations. On the one hand, this can be attributed to the business focus of the sectors most frequently affected. On the other hand, service providers carrying out high investments in Information Technologies (IT) are six times as often affected by the shortage of qualified personnel as companies making only minor investments in IT.

By giving foreign IT specialists easier access to the German labour market, shortages can be compensated in the short run in some cases. There is no rea-

son to fear job losses because of the employment of foreign specialists. Quite to the contrary, innovative projects which become viable precisely because of their employment will lead to further job creation.

Apart from these short-term measures, however, it is even more important to ensure well-qualified junior professionals in Germany in the medium or long run. Therefore it is important, at this point of time, to take measures, whose effects will begin to show only in several years from now. Today's increasing number of university students registering for computer science will have an impact on the labour market in four to six years due to normal period of study in Germany. However, measures concerning educational policy need to start at an even earlier stage and must promote the acquisition of IT skills already at schools.

Companies can also contribute to the development of qualified personnel: Studies suggest that companies suffering from a shortage of qualified labour have not increased their further training expenses due to this shortage. Particularly the prolongation of project terms – the most frequently stated effect of skill shortage stated by companies – probably could be reduced by implementing more further training measures. ◀

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Research Findings

Business-related Services: High Investments in IT-Infrastructure

Business-related services are increasingly being assisted by modern information and communication technologies (IT). The Internet is well accepted among the firms of this economic branch. They use E-Commerce as a distribution channel primarily for their business relations with other firms and less often for their customer contacts. This was found in a recent survey of the ZEW.

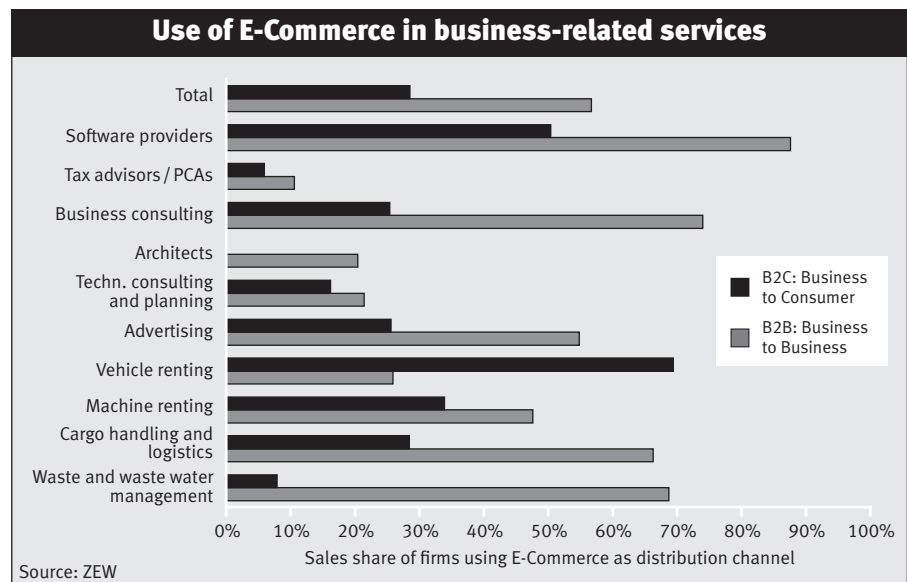
■ The study is based on a business survey among approximately 1,000 business-related services firms which the ZEW conducts on a quarterly basis in cooperation with the “Verband der Vereine Creditreform” in Neuss. The economic sector of business-related services encompasses tax advisors and certified public accountants, business consultants, architects, technical consultants and planners, vehicle renting, machine renting, cargo handling and logistic firms, software providers, advertising agencies and waste management firms.

In 1999 business-related services invested on average one to three percent of their sales in IT, even though the IT-infrastructure is already well developed in this economic sector. Firms with Internet access account for 96 percent of the sales generated by the business-related services sector, and firms presenting themselves with a Homepage in the Internet account for a sales share exceeding 80 percent. Firms using e-mail earned nearly 95 percent of the sales in this sector, and firms using in-house Intranet generated more than 60 percent.

E-Commerce

Some of the business-related services firms are already using Electronic Commerce (E-Commerce) as a new distribution channel, which is opening up via the new IT technologies. E-Commerce is used more frequently for business relations with other firms (Business to Business – B2B) than for business relations with consumers (Business to Consumer – B2C).

Approximately 60 percent of the total sales of business-related services is generated by firms that are using the new



business platform in B2B in addition to traditional distribution channels. Software providers account for the highest degree of acceptance of the new sales instrument: Firms using E-Commerce at least occasionally for business transactions generate for 88 percent of this sector's sales. Tax advisors and certified public accountants, technical consultants and planners as well as architects account for the lowest sales share.

The situation looks different in B2C business: Firms using E-Commerce in B2C account for only 30 percent of total sales generated by business-related services. Vehicle rental firms are leading in the use of E-Commerce in B2C. Firms using E-Commerce generate approximately 70 percent of this sector's sales. They are followed by the software providers (50 percent). Architects, however, hardly use E-Commerce for B2C transactions at all.

Nearly 30 percent of total sales of business-related services is produced

by firms stating that the Internet helps them to reduce costs, for instance through a higher price transparency in procurement markets. The average savings potential amounts to a three percent share of total sales. Software providers, architects as well as tax advisors and certified public accountants benefit most from the Internet. Their cost reductions correspond, on average, to a five percent sales share. The other industries of the business-related services, however, expect only minor saving potentials of the Internet.

The future plans of business-related services firms demonstrate that they are convinced that it is profitable to create a good IT-infrastructure: Firms intending to enhance their IT-infrastructure on a medium-term basis account for more than 80 percent of the sales of business-related services. The average capital investment will presumably amount to ten percent of gross fixed investment. ◀

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Research Findings

Education and Individual Performance

Learning at school and university and also at the work place has become more important in the knowledge-based economy. The incidence and the impact of training on individuals depend on the national education and training system. However, selectivity, individual heterogeneity, self selection, diversity of training institutions and general equilibrium effects seem to play an important role in all training systems.

■ Although there is a widespread belief in a positive relationship between education, training and growth, the evidence provided so far is not yet complete. In a new study, which was promoted by the European Centre for the Development of Vocational Training (CEDEFOP), the ZEW provided a critical review of recent micro-econometric work on the determinants and impacts of training in European countries.

Aggregate figures for the European Union suggest a clear hierarchical pattern in the labour market: Those who are better educated are on average better represented in the work force, have higher earnings, participate more frequently in formal continuous training, are less often unemployed, are more often self-employed, and work with newer and

are not negligible, in fact they are sometimes rather large. The fact that training has positive effects is, however, no guideline per se for government activity. There is evidence that self-selection on the one hand and general equilibrium effects on the other are at work. As a rule, training has positive effects and net benefits for trainees. However, there is some evidence that net effects for non-trainees might not be positive. In these cases, training might be a bad investment for the respective people, firms and – from the viewpoint of economic efficiency – for society.

Selectivity, diversity of training, selection and general equilibrium effects seem to play an important role in all training systems. The empirical results suggest that the more structured the whole

through labour markets begins after compulsory school attendance. If the

level of more general types of skills learned in schools is high, training at the workplace plays a different role and is no longer responsible for building up these more general types of skills. Such mechanisms seem to be responsible for the lower returns to continuous training in Germany and France compared to the United Kingdom. Conversely, the less structured the public education system is, the higher the measured returns of continuous training seem to be.

Differences across Europe

European training systems differ. The different types of investment in vocational education and training and the spacing of these investments over an individual's life and the role of the State will depend on differences in prices for education, expected wage profiles, the skill structure of the workforce, tradition and technological factors. Success at school and other training institutions is not the only factor explaining work-related success and careers. Labour market regulations and institutions might lead to insider power and create entry barriers and waiting queues for young workers, despite higher education and greater investment in training. Such mechanisms seem to be present in most European countries, although to different degrees.

Some of the findings from the literature are a challenge to the role of government in training. Longer term impacts on individual performance can especially be expected when people are young and when the educational institutions are of high quality. At other times in an individual's working life, non-formal learning, regional, firm or occupational mobility might on average be more helpful. ◀

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Aggregate indicators for 15 European countries (1997)



more high tech equipment. This pattern seems to have been rather stable over the past decades, although continuing skill-biased technological change is a challenge for all education and training systems in Europe.

The review of recent econometric work for various European countries indicates that training is beneficial for both firms and individuals. The benefits

training system is and the more investment in general human capital acquired while a person is young, the lower the returns to continuous training are after this high initial investment. If education is centralised and compulsory school attendance is expanded, then all people should achieve higher levels of education and formal skill levels. Selection into different career pathways transmitted

ZEW Workshop

ZEW Summer Workshop: Applied Public and Environmental Economics

■ This is the second time since 1999 that ZEW had its Summer Workshop from 19 to 21 June 2000. The topic of this year's event was "Applied Public and Environmental Economics". The

progressive taxation could reduce unemployment. He then turned to the question of efficient old age provision. In accordance with the prevailing opinion in literature, he arrived at the con-

clusion that it is not possible to transform the current pay-as-you-go system into a fully funded system without creating disadvantages for one of the generations.

the economic models used for social cost evaluations of road traffic. He emphasised that congestion costs are by far more significant than air pollution and accidents. For this reason Proost was decidedly in favour of road tolls which are an adequate means to internalise such costs. ◀

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The participants in the ZEW Summer Workshop „Applied Public and Environmental Economics“.

programme included, on the one hand, lectures that were given by renowned professors. On the other hand, young scientists had the opportunity to present their research findings. Their findings were then reviewed by the experienced scientists, and all those present discussed them. Seven non-local junior scientists as well as two members of ZEW participated in the Summer Workshop. All of them have recently obtained their doctorate or will take it in the near future.

Overview of the lectures

Prof. Dr. Wolfgang Wiegand, University of Regensburg, Prof. Robert Inman Ph.D., Wharton School, University of Pennsylvania, and Professor Stef Proost Ph.D., University of Leuven, were the main speakers. Everyone gave an overview of his respective special field and provided insights into his research work.

During his first lecture "Taxation and Unemployment" Professor Wiegand created quite a stir with his thesis, that

conclusion that it is not possible to transform the current pay-as-you-go system into a fully funded system without creating disadvantages for one of the generations.

Professor Inman started his speech by giving an overview of the theory of fiscal competition between suburbs and metropolitan areas. The suburbs finance local public goods that are demanded by the inhabitants (for instance kindergartens or schools) through local taxes. The US-American experience demonstrates, in accordance with this theory, that this kind of competition yields efficient results. In his second lecture,

Inman presented his study on the city of Philadelphia. He demonstrated that tax rate increases lead to a very pronounced exodus of production factors and tax payers. Consequently, tax receipts cease to increase and even fall, if tax rates are raised.

Professor Proost eventually presented a host of scientific approaches from the field of transport policy. Among other things he gave a bird's eye view of

Presentations of Junior Scientists

"Social security strategies and redistributive effects in European social transfer systems", Margit Kraus, ZEW
"Capital mobility within the European Union", Joeri Gorter, Netherlands Bureau for Economic Policy Analysis (Netherlands), (joint paper with Ashok Parikh)

"Tax administration under different federal settings: Leviathan or benevolent?", Alex Esteller-Moré, Universitat de Barcelona (Spain)

"An empirical analysis of vertical tax externalities: The case of personal income taxation in Canada", Albert Solé-Ollé, Universitat de Barcelona (Spain), (joint paper with Alex Esteller-Moré)

"Is your neighbor's policy affecting your tax base? A quantification of local fiscal externalities", Thiess Büttner, ZEW

"Leviathan and tax competition in federations", Christos Kotsogiannis, University of Southampton (UK), (joint paper with Michael Keen)

"Bureaucratic corruption and environmental policy: Theory and evidence from the United States", Per Fredriksson, Southern Methodist University, Dallas, (USA), (joint paper with Daniel Millimet)

"Private secondary benefits of greenhouse gas abatement and renegotiations of international environmental treaties", Dirk Rübhelke, Technische Universität Chemnitz

"Effects of the polluter pays principle on control of acid rain", Yoko Nagase, University of Virginia (USA), (joint paper with Emilson Silva)

ZEW Kolloquium

Global Climate Protection only within Reach with Tradable Emissions

■ The Kyoto Protocol of the year 1997 was a milestone for global climate protection. Its ratification brought sovereign states to make the first legally binding promises of reducing greenhouse gas emissions. A total of thirty-eight industrial countries have obligated themselves to lower their greenhouse gas emissions during the period between 2008 and 2012 to a total of 5.2 percent less than 1990 values. On the other hand, the developing countries, who see the industrial countries as the chief culprits of the greenhouse gas problem, refused any concrete commitment to reduce emissions by stating that this could limit their economic growth. How-

Economics, Environmental Management”, investigated in his lecture how a globally effective and politically realizable climate-protection strategy might look with the participation of the developing countries.

C&C-Climate Protection Scenario

By 2050, the global greenhouse gas emissions should be reduced by 25 percent from the current level (contraction) in accordance of the Intergovernmental Panel on Climate Change. The inevitable inclusion of the developing countries is only possible if the distribution of emissions rights, in which the

tion budget would be reduced linearly by 25 percent from the current level over the next 50 years. The rights for the globally available greenhouse gas emissions would then be distributed according to a gradual change from the actual per capita distribution to an equal per capita endowment. This equal endowment should be finally reached in the year 2050. In comparison with a reference development without an active climate protection, C&C implies a drastic emission limitation for many regions of the world.

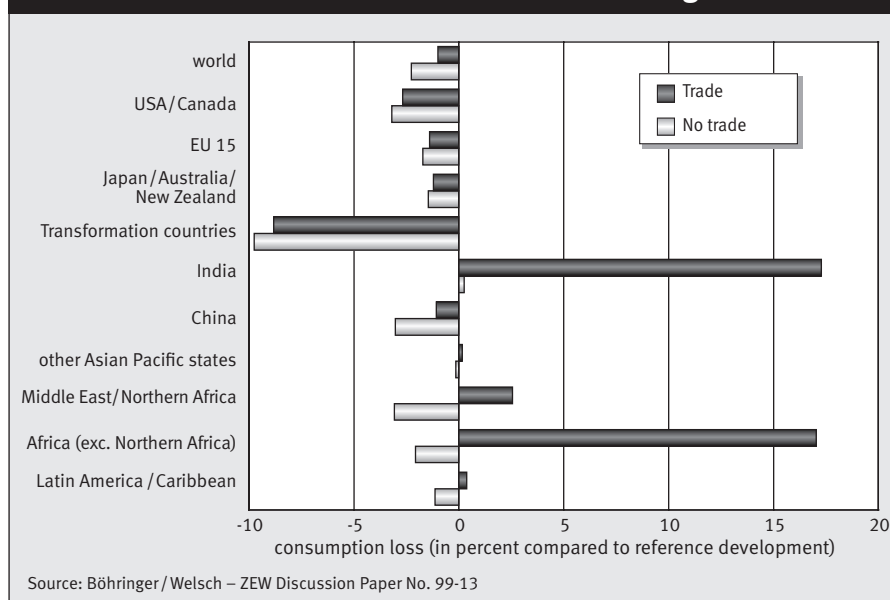
The illustration visualizes the economic effects of the C&C scenario, which are simulated with the general equilibrium modeling system developed by the ZEW called PACE (Policy Assessment based on Computable Equilibrium). In the simulation, two different assumptions are made as to how individual regions fulfill their emission-reduction obligations. In the variant “no trade”, it is assumed that each region uses a national carbon tax to realize its reduction obligation. The variant “trade”, however, allows each region the use of a world-wide trade of emission-reduction rights.

Variant “trade” reduces cost of climate protection

The comparison of the two variants “trade” and “no trade” shows not only that a global emission-rights trade cuts the cost of climate protection in over a half. What is politically much more significant is that not only can important developing regions compensate economic burdens from global climate protection through emission rights distributed by C&C, but also that they partially come out much better than in a reference development without climate protection. Since these countries are leading a heated debate on justifiable burden distribution of climate protection, the implementation of the C&C scenario seems only politically feasible within the framework of a tradable permit system. ◀

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Welfare effects of Contraction and Convergence



ever, if the developing countries are not included in the global protection of the climate soon, then there won't be an effective climate protection. The forecast says that global emissions will grow substantially, in spite of Kyoto, as a result of the economic and emission-growth in the developing countries. On the other side of the coin, a drastic reduction of the current greenhouse gas emissions in the next decades is necessary to avoid an all-too evident global warming.

With this in mind, Dr. Christoph Böhringer, head of the ZEW research department “Environmental and Resource

quantities are globally limited, correspond to elementary fairness criteria. Here, an egalitarian approach imposes itself, which allows every individual the same right to the emission of greenhouse gases.

In view of the fact that there are clear differences specific to each country as to the current greenhouse gas emissions per capita, the proposal to reduce greenhouse gases is acceptable in the industrial countries' view only in combination with a convergence phase. Böhringer assumed, for the development of the contraction and convergence path (C&C), that the global emis-

ZEW Financial Market Test

Results of the Survey in July 2000

■ The Financial Market Test conducted by the ZEW is a monthly business survey of German financial market experts which started in December 1991. The survey asks for the predominant expectations about the development in six international financial markets.

As a whole around 400 experts take part in the survey. 270 of them work in banks, 50 in insurance companies, 40 in investment companies and 40 in other industries. Participants in the survey are

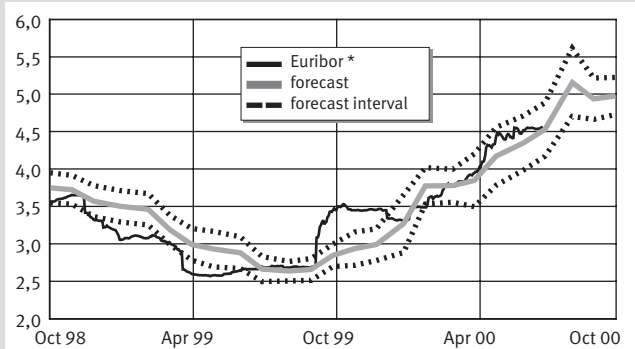
financial experts of the finance departments, the research departments and the economic departments as well as the investment and securities departments of the firms. In detail, the financial experts are questioned on their medium term expectations about the development of important international financial markets with respect to the business cycle, the inflation rate, short term and long term interest rates, the exchange rate and share prices.

To construct forecasted figures, the qualitative response categories (increasing, unchanged, declining) are transformed into quantitative figures by the Carlson/Parkin procedure. Additional information to the applied procedure is available as an abridged version published by the ZEW. The present survey was conducted between July 3, 2000 and July 18, 2000 and all calculations are termed to July 21, 2000. ◀

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Euroland: Diminishing Worries about Interest Rates Boost Share Prices

Euribor: Development and forecast



Source: Datastream, ZEW

* until January 4, 1999 FIBOR (3M)

■ According to financial market experts, German Blue Chip shares should be overweighted when investing in Europe in the next months. In July, 77 percent of the experts gave the DAX the best grades among Europe's stock markets. France and Italy are following closely. 75, or rather just under 72 percent of the experts believe that these stock markets will rise in the medium term. The most recent equity price increases of the German stock price indicator seem to confirm this assessment. According to the forecasts, the DAX might attain around 7.800 points by October. Just under 35.000 points are expected for the Italian MIBtel, and the French CAC-40 is likely to approach the mark of 7.000 points. Investors should keep an eye on an upside target of approximately 5.700 for the Euro Stoxx 50. An

percentage points less than for the DAX. Nevertheless, with 6,550 points the October forecast exceeds the current level by about 14 percent. In the light of the recent turbulences which resulted in hefty losses in the new economy stocks, exceeding 50 percent for some high-tech companies, this prospect will be quite reassuring for some investors.

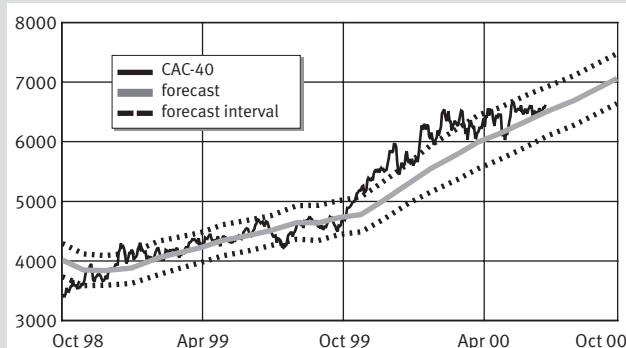
Expectations concerning the European key interest rates will support the positive assessments for stocks in Euroland. For instance, the number of experts interview-

ed expecting further interest rate increases from the European Central Bank has decreased to a good 76 percent in July. In May, more than 90 percent still held the opinion that Mr. Duisenberg, Director of the ECB, would push up the short-term interest rates in Euroland even further. In total, the survey resulted in a forecast of five percent until October for the three-month-Euribor. Nevertheless, the most recent inflationary data still do not give an all-clear at the interest rate front. On the contrary: the price increase rate has accelerated from 1.9 percent in May to 2.4 percent in June. In addition, business activity has speeded up in Euroland. Almost 50 percent of the experts said that the current economic situation was good, compared to only 36 percent in May. ◀

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CAC-40: Development and forecast



Source: Datastream, ZEW

Publications

ZEW Economic Studies

Rennings, Klaus; Hohmeyer, Olav, Ottinger, Richard L. (Eds.):

Social Costs and Sustainable Mobility

Fair and efficient pricing has become increasingly important in international environmental and transport policy. Thus the valuation and internationalization of social costs is now a crucial element within strategies towards sustainable mobility. The book provides methods and results from major European and American studies evaluating both social costs of transport and first experiences with their internationalization in different contexts: infrastructure planning, urban road pricing and highway tolling. Additionally, complementary non-monetary instruments for a transition towards sustainable mobility are presented and discussed.

Vol. 7, Heidelberg/New York (Physica), 2000, ISBN 3-7908-1260-9

Legler, Harald; Licht, Georg; Spielkamp, Alfred:

Germany's Technological Performance

The research results presented in this book are part of the continuous reporting on the technological performance of the German economy. The indicators of technological performance show a high efficiency of the German innovation system in the short term. New knowledge is rapidly transformed into patents, innovative activities are growing independently of the business cycle, and German enterprises are well established on international markets. With respect to the medium and long term, however, the expansion of the R&D-intensive sectors, R&D activities in general and start-ups do not seem to be strong enough, and the service sector lacks prominent features in international comparison. While there are potentials, they are not sufficiently being mobilised. The strength of the German innovation system lies in advanced technologies. But Germany is also the technical leader in some areas. Being a „fast follower“ by quickly integrating new technologies in innovative products and processes should prove a successful strategy. Education and further training need to be designed to support a change towards a knowledge society. Innovation policy should promote solutions in all parts of the economy and society.

Vol. 8, Heidelberg/New York (Physica), 2000, ISBN 3-7908-1281-1.

You may also order these books online: www.springer.de/cgi-bin/search_book.pl?series=4041

■ Discussion Papers

Falk, Martin; Koebel, Bertrand: *A Dynamic Heterogeneous Labour Demand Model for German Manufacturing*, No. 00-16.

Börsch-Supan, Axel; Köke, F. Jens: *An Applied Econometricians' View of Empirical Corporate Governance Studies*, No. 00-17.

Heinemann, Friedrich: *After the Death of Inflation: Will Fiscal Drag Survive?*, No. 00-19.

Köke, F. Jens; Salem, Tanja: *Corporate Finance and Restructuring: Evidence from Central and Eastern Europe*, No. 00-21.

Kaiser, Ulrich; Kreuter, Markus; Niggemann, Hiltrud: *The ZEW/Creditreform*

Business Survey in the Business-related Service Sector: Sampling Frame, Stratification, Expansion and Results, No. 00-22.

Böhringer, Christoph; Hoffmann, Tim; Vögele, Stefan: *The Cost of Phasing Out Nuclear Power. A Quantitative Assessment of Alternative Scenarios for Germany*, No. 00-23.

Gerfin, Michael; Lechner, Michael: *Microeconomic Evaluation of the Active Labour Market Policy in Switzerland*, No. 00-24.

Kaiser, Ulrich: *Research Cooperation and Research Expenditures with Endogenous Absorptive Capacity. Theory and Microeconomic Evidence for the Ger-*

man Service Sector, No. 00-25.

Entorf, Horst; Spengler, Hannes: *Criminality, Social Cohesion, and Economic Performance*, No. 00-27.

Pfeiffer, Friedhelm: *Training and Individual Performance in Europe: Evidence from Microeconomic Studies*, No. 00-28.

Kraus, Margit; Wirth, Steffen: *Savings, Expectations and Technological Unemployment. A Generalization of Assumptions for the Hicksian Fixwage Traverse*, No. 00-29.

Koschel, Henrike: *Substitution Elasticities between Capital, Labour, Material, Electricity and Fossil Fuels in German Producing and Service Sectors*, No. 00-31.

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