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## Apprenticeship Training at a Glance

Structural Training and Employment Data (Edition 2006)

**T**he public shows continuing interest in information about apprenticeship training, with long-term developments being presented on the basis of key aspects. This information requirement is met by the periodical publication of the *ibw* - Austrian Institute for Research on Qualifications and Training of the Austrian Economy, which comes out under the title "Apprenticeship Training at a Glance".

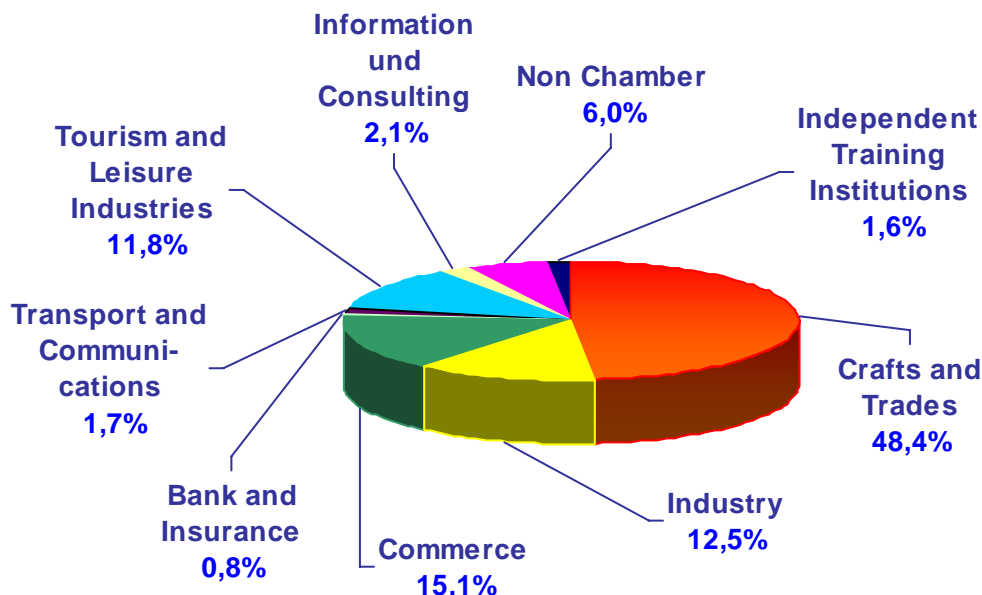
*Two thirds of apprentices are male, one third is female*

In late 2005, a total of 122,300 young people were in an apprenticeship programme, with approximately 113,000 or 92 percent of them in the Crafts and Trade section. In 2005, 33 percent of all apprentices were female. The share of female apprentices has remained largely constant since the 70s.

The second largest training section is Commerce with nearly 18,500 apprentices, followed by Industry (nearly 15,400), and the Tourism and Leisure Industries section with more than 14,400 apprentices. The youngest section, which was introduced in 2002, is termed Information und Consulting and already boasted over 2,500 apprentices in 2005.

GRAPH 1:

**Distribution of apprentices over sections, 2005, in %**  
(n apprentices 2005=122,378)



Source: Austrian Federal Economic Chamber, Apprenticeship Statistics; own calculations

### *Training by sections*

48 percent of apprentices are trained in the largest training section Crafts and Trade (see Graph 1). This predominance applies even slightly more to the distribution of training enterprises: 57 percent of approximately 38,400 training enterprises are active in this section.

*Dual training conducted at training enterprises and part-time vocational schools is the strongest VET route after compulsory schooling*

Both when analysing *input* (students of the tenth school year) with about 40 percent of young people undergoing schooling, and even more so when examining *output* (in 2001: 37 percent of the 20-24-year-old residential popu-

lation have an apprenticeship certificate), apprenticeship training is the by far strongest VET route in Austria. Without the specific integration and skilling options provided by dual training in training enterprises and part-time vocational schools, the share of young adults without a vocational qualification would not be 17 but more than 25 percent.

As expected, shares among young men are by far higher, which is due to their more pronounced interest in dual training: With a total rate of 49 percent, the provinces Vorarlberg, Tyrol and Upper Austria come to 55 percent and more of male students in the tenth grade.

### *Differences by provinces*

The available data material shows that apprenticeship training has taken different courses of development in the various provinces. The apprenticeship beginners' rate in relation to the total number of young people undergoing training is at about 40 percent. Depending on the distribution of young people in the first year of post-compulsory education, pronounced differences between the provinces can be observed, which are due *inter alia* to the predominant economic and occupational structures. The rate of apprenticeship beginners/ vocational school students in Vorarlberg, Tyrol and Upper Austria is 45 and more percent of young people in training in the tenth grade.

### *Distribution by apprenticeship occupations*

In 2005, the 50 most popular apprenticeship trades or apprenticeship trade combinations (double training programmes) account for a total of 84 percent of training relationships. The by far most popular apprenticeship occupation is "retail trade services" (general retail trade plus retail trade with ten different specialisations) with nearly 14,300 apprentices, followed by "motor vehicle engineering", "office assistant", "hairdresser and wig-maker (stylist)", and "electrical installations engineering".

On the basis of a summary of all apprenticeship occupations into four areas it is possible to outline the structures and structural changes. In the segment of *technical and trade apprenticeship occupations* (52 percent of training relationships in 2005), a relative decline in training relationships as against 1994 can be observed. *Office and commerce* combine one quarter of training relationships; *tourism, food & beverages, and personal services* one fifth. The *ICT* occupations make up 3,000 training relationships in 2005.

The shares of the groups of apprenticeship occupations can be assessed as relatively stable, with shifts becoming effective primarily on the level of individual occupations. The apprenticeship group *Commerce and Transport* comprises nearly one quarter of all vocational school students, eight apprenticeship groups in the field of *Metal* (according to the vocational school statistics) combined also make up one quarter of apprentices.

### *Training by company size*

The breakdown of the apprenticeship figures by company size shows clearly that apprenticeship training has a pronounced SME focus: Almost 70 percent of apprentices are trained in companies with fewer than 50 employees; 25 percent in companies between 50 and 1,000 employees; only 3 percent receive training in large enterprises.

In 2005, in all of Austria, nearly 50 percent of training enterprises provided training to one apprentice, another fifth of all training enterprises accounted for 2 apprentices, and 30 percent of all training enterprises have three or more apprentices. The share of training enterprises with one apprentice is above average in the sections of *Commerce* and *Transport and Communications* with almost 60 percent respectively, which is only exceeded by the *Information and Consulting* section (70 percent).

### *Reproduction of skilled labour by sectors and economic sections*

According to the most recent census, 55 percent of apprentices are trained in the services sector and 44 percent in the secondary sector.

In this context it is particularly revealing to analyse the relationship between apprentices and apprenticeship graduates in the sectors and economic sections. Whereas the number of apprentices across all sectors amounts to 7.4 percent of the number of apprenticeship graduates, the percentage in the services sector is 6.8 percent and in the secondary sector (manufacturing, construction, electricity/gas/water, mining) nearly 9 percent (see Graph 3).

The individual services sectors present different "skilled workers reproduction figures". Above-average ratios can be noted for *hotels and restaurants* (12 percent), *other community, social and personal service activities*, and the economic section *wholesale and retail trade, repair of motor vehicles, motorcycles and personal and household goods* - this trend is even more pronounced when disaggregating further. In the subsections *transport, storage and communications* as well as *public administration and defence; compulsory social security*, below-average reproduction rates of skilled workers with an apprenticeship certificate can be found in most cases.

### *Output of dual training with impact on the labour market*

By the age of 20, most VET programmed should have been completed. According to the latest census, 45.5 percent of the economically active population aged between 20 and 24 had an apprenticeship certificate, 13.5 percent had successfully completed a VET school, and 15.4 percent a VET college or a post-secondary course in VET. This means that - when analysing the output with impact on the labour market - that the dual

training system is the quantitatively by far strongest qualification route.

Due to the more pronounced interest in dual training among male young people (see above), also output of apprenticeship training is clearly higher among them: Among 20-to-24-year-old men in gainful employment, the rate is at nearly 57 percent, among women at 33 percent.

### *Apprenticeship graduates in the labour market*

According to the latest census, approximately 42 percent of the economically active population in their prime age (between 20 and 64) boast an apprenticeship certificate, among men this share is 52 percent, among women 29 percent. In the *small crafts and related occupations*, apprenticeship graduates make up 71 percent of people in employment, in the occupational group *services occupations and salespeople* 48 percent.

The occupational group *clerical and commercial staff* comes to a share of apprenticeship graduates of 36 percent, among *technicians and equivalent non-technical skilled workers* the share of apprenticeship graduates is 30 percent. Apprenticeship graduates make up nearly 50 percent of the heads of small companies and 35 percent of the business (unit) managers of large enterprises.

The unemployment rate among apprenticeship graduates is almost 6 percentage points lower than among people who have not completed a VET path. In 2005 the unemployment rate among apprenticeship graduates was 4.3 percent and hence clearly below the average of 5.2 percent, as well as below the unemployment rate of graduates of secondary schools and VET colleges (4.6 percent) (see Graph 2).

The apprenticeship graduates' duration of unemployment was an average of 107 days in 2005, whereas the national average duration was clearly higher with 117 days. The relationship between vacancies (in the print media) and registered unemployed people over the year can be GRAPH 2:

rated as more favourable for apprenticeship graduates than for graduates of VET schools, VET colleges, secondary schools, and university related institutions.

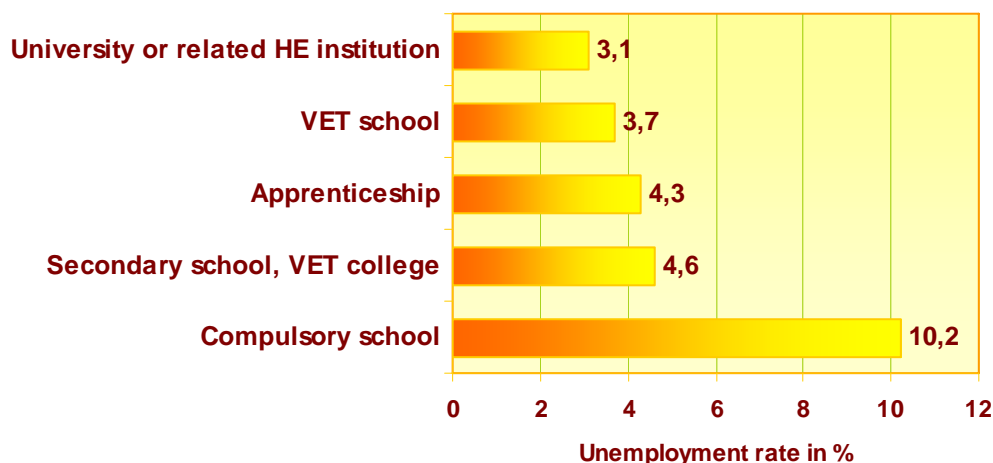
Negative presentations of the labour market situation of apprenticeship graduates as they are sometimes published in the media are based on a misinterpretation of statistical material, in which context the number of unemployed people by formal educational attainment is analysed without taking into account the high share of apprenticeship graduates among the economically active population. Under that perspective, merely the distribution of registered unemployment by formal educational attainment forms the basis, whereas the perspective substantiated from the viewpoint of the economics of education<sup>1</sup> is the share of unemployed in the economically active population.

### *Interface problems and demographic development*

Interface problems remain severe even though the responsible employees of the competent ministries, social partners and in the provinces have developed and implemented major approaches since 1996 and considerable funds (training premium, Blum bonus<sup>2</sup> and many more measures) have been made available.<sup>3</sup>

New instruments are now being applied such as the approaches of *integrative vocational training* and other support measures (such as courses or "coaching for apprentices"). Due to the structural changes of occupations, the changed conditions in which people grow up, migration, and the objective of general inclusion in education following compulsory schooling, which has been manifested publicly since the 90s, new challenges arise at the point of transition from compulsory school to employment via education and training.<sup>4</sup> For the future, on the one hand, there are hopes for a demographic relief in the apprenticeship post market, on the other hand, however, mental and structural adjustment problems remain.

**Unemployment rate by formal educational attainment, 2005, in %**  
(n unemployed people 2005=207,700)

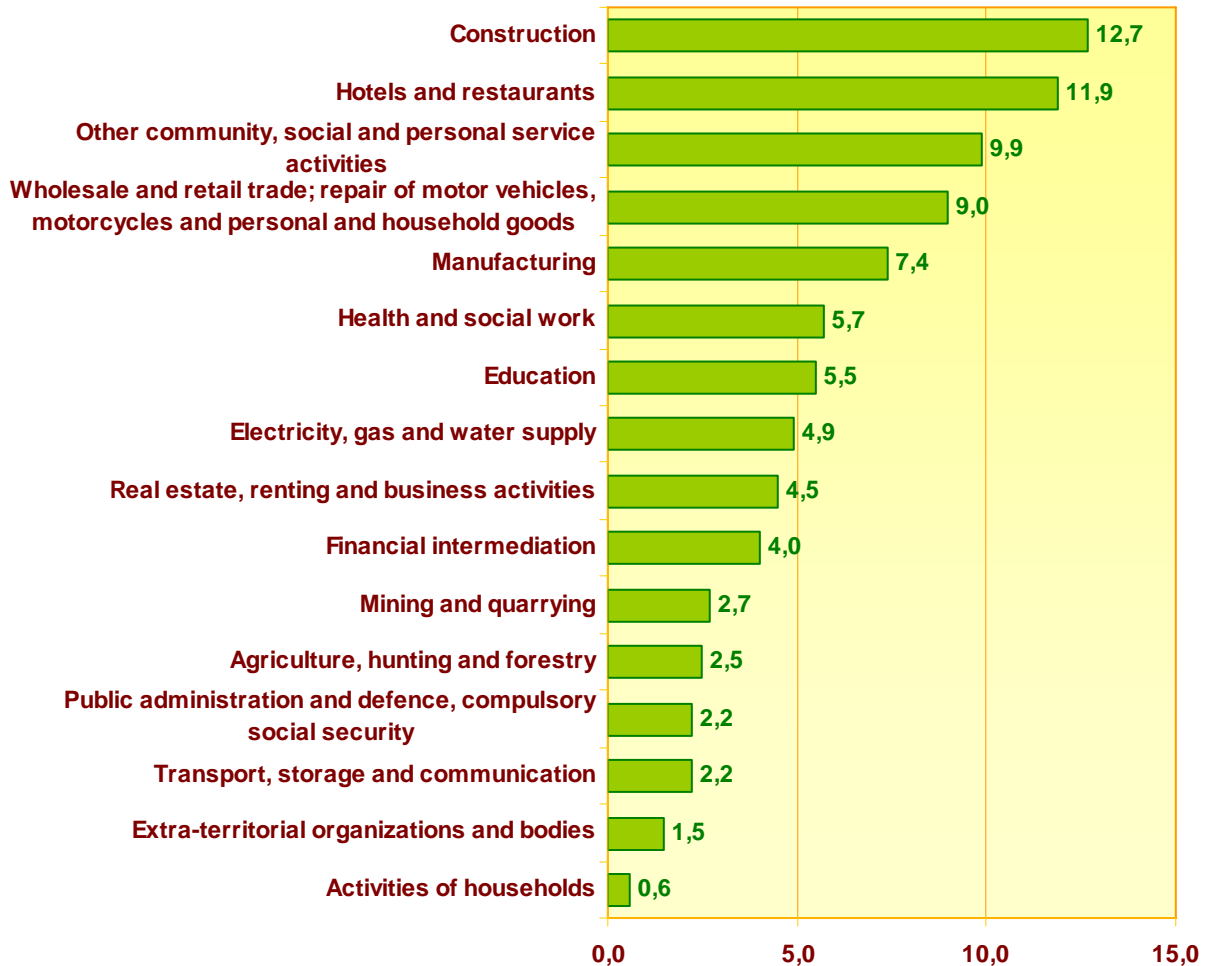


Source: Statistics Austria, Microcensus Labour Force Survey

GRAPH 3:

**Percentage\* of apprentices in comparison to the number of apprenticeship graduates broken down by economic sections, 2001**

(apprentices n=119,187; apprenticeship graduates n=1,610,799)



\* The higher the percentage, the higher the self-reproduction of skilled workers with an apprenticeship certificate in the sector

Source: Statistics Austria, Census 2001; ISIS DB query; own calculations

This research brief is a short version of the study Education & Economy No. 37 with the same title.  
Download: <http://www.ibw.at/html/buw/bw37.pdf>

<sup>1</sup> Whether within the meaning of the filter theory or the human capital theory, cf. Williams, Gareth L.: The Economic Approach. In: Burton R. Clark (ed.): Perspectives in Higher Education, Berkeley - Los Angeles - London, 1987.

<sup>2</sup> Cf: [www.egon-blum.at](http://www.egon-blum.at)

<sup>3</sup> Cf: Wagner-Pinter, Michael: Rejuvenating the Austrian apprenticeship system, in: European Commission: European Employment Observatory Review: Spring 2005, Luxembourg, 2006. Document to download at: [http://www.eu-employment-observatory.net/resources/reviews/spring\\_rvw\\_05\\_en.pdf](http://www.eu-employment-observatory.net/resources/reviews/spring_rvw_05_en.pdf), 23-08-2006.

<sup>4</sup> Cf.: Steiner, Mario / Lassnigg, Lorenz: Schnittstellenproblematik in der Sekundarstufe, in: Erziehung und Unterricht, Österreichische pädagogische Zeitschrift, 150th annual volume, Booklet 9/10 2000, öbv & hpt Verlag, Vienna, 2000, p. 1066; Schneeberger, Arthur: Herausforderungen der Aus- und Weiterbildungspolitik durch Strukturwandel, Migration und Internationalisierung, in: ibw-Mitteilungen, 1st quarter 2005, Vienna, 2005, p. 1-25. Document to download at: [http://www.ibw.at/ibw\\_mitteilungen/art/schn\\_159\\_05\\_wp.pdf](http://www.ibw.at/ibw_mitteilungen/art/schn_159_05_wp.pdf).

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