

8 March 2021

Development on the Czech labour market in the Q4 2020

In the fourth quarter of 2020, the Czech labour market was influenced by another big wave of quarantine measures. The unemployment was gradually increasing and employment was decreasing. The average wage nominally increased by 6.5%, year-on-year (y-o-y); growth of prices somewhat slackened and therefore earnings increased in real terms by 3.8%. The development in individual industries (economic activities) was very differentiated; accommodation and food service activities were affected most of all.

Hours worked, employment, unemployment, and economic inactivity

Data about hours worked by individual month drawing from the Labour Force Sample Survey (LFSS), see Chart 1, are the most characteristic results describing the influence of the coronavirus crisis on the economy. They have been specially prepared since March and published within the News Release of the Czech Statistical Office (CZSO) called Rates of employment, unemployment and economic activity.

Chart 1: Weekly hours actually worked in the main job from the LFSS, year-on-year increase/decrease





The spring episode showed higher falls of hours worked than the autumn one. A much worse situation can be found in the group of the self-employed (entrepreneurs) than among employees. In the Q4 2020, the average number of weekly hours actually worked by employees decreased by 3.2 hours to 32.5 hours; entrepreneurs worked by 7.2 hours less (decrease to 33.9 hours). As for economic activities, the highest decrease was in the section of accommodation and food service activities (by 14.7 hours, year-on-year, i.e. by almost 40%).

Standard aggregate indicators of the LFSS depict progressing fall in the employment. Here it has to be reminded that the LFSS covers only persons living in dwellings (flats), not those living in hostels and similar collective households, which has a negative influence on the capture of foreigners who often use such ways of housing.

For the Q4 2020, the number of working persons decreased by 87.5 thousand persons, i.e. by 1.6%, y-o-y, to 5 217.2 thousand persons. A decrease of female employment was much more marked: the number of males decreased by 32.0 thousand and the number of females by 55.5 thousand. The employment rate (74.3%) in the age group of 15–64 years decreased by 1.0 percentage point (p. p.). Development in individual economic activities (sections of the CZ-NACE classification) was uneven; a decrease can be found mainly in manufacturing (by 79.3 thousand).

Part of the outflow of the working persons headed towards unemployment (year-on-year increase by 52.5 thousand) and the other ones remained, at least temporarily, economically inactive (49.8 thousand), mainly because they were not seeking a job. The number of economically inactive persons aged 15+ years thus reached 3 609.1 thousand. The number of economically inactive females increased mainly in those aged up to 29 years (by 20.1 thousand). As for the educational attainment, they are most of all females with higher education and females with secondary education with A-level examination. On the contrary, among males, the increase occurred mainly in the age group of 60+ years (by 10.7 thousand).

The total number of the unemployed according to the LFSS (persons who seek a job in an active manner as defined by the International Labour Organisation (ILO)) reached 161.7 thousand persons and the general unemployment rate increased to 3.1% (by 1.0 p. p.). As for comparison of Regions, the highest year-on-year increase of the unemployment rate and concurrently the highest value was in the *Karlovarský* Region (by 2.3 p. p. to 6.1%) and in the *Ústecký* Region (by 2.2 p. p. to 4.6%). On the contrary, the lowest unemployment rate was in the *Pardubický* Region (1.3%) and in the *Zlínský* Region (1.8%).

Registered number of employees expressed as full-time equivalent employees

Preliminary data of the CZSO business statistics show a sharp decrease in the registered number of employees. In the Q4 2020, compared to the corresponding period of the previous year, there were by 117.2 thousand employees less in full-time equivalent, which is a relative decrease by 2.9%. Thus, the registered number of employees fell below the level of 4 million (3 992.1 thousand) already for the third successive quarter. However, compared to the previous two quarters, it is a certain mitigation of the fall, because the decreases were 3.4% in the Q2 2020 and 3.1% in the Q3 2020.



As for individual industries (economic activities), the situation was very heterogeneous; it was depending mainly on what possibilities individual branches had to cope with the abnormal situation. In general, an overall majority (53%) of the decrease in the number of employees was in the tertiary sector (services), 44% were in industry, and a small remainder was in agriculture and construction.

At the same time, we can find six economic activities of the CZ-NACE, in which the number of employees increased. Only one of them belongs to the secondary sector – it is a very small economic activity of 'water supply; sewerage, waste management and remediation activities' (CZ-NACE E; 2.6%). The highest increment can be found in 'education' (CZ-NACE P) by 6.8 thousand, which is a relative increase by 2.2%. The second highest increase was in 'real estate activities' (CZ-NACE L); it was by 6.5 thousand, which was in relative terms by 14.5%, because it is a very small economic activity. A marked increase was further in 'human health and social work activities' (CZ-NACE Q; 2.5 thousand; i.e. by 0.8%). In 'public administration and defence; compulsory social security' (CZ-NACE O) and in 'information and communication' (CZ-NACE J) the number of FTE employees increased by 0.5 thousand in each of them.

On the other hand, the registered number of employees decreased the most in 'accommodation and food service activities' (CZ-NACE I), in which there was a decrease by 23.7 thousand, which means that almost every fifth employee lost his/her job (18.8%). A decrease also occurred in 'administrative and support service activities' (CZ-NACE N) with the drop by 24.2 thousand, which is 12.2%.

In industrial economic activities, the decrease was relatively the most considerable (9.3%) in 'mining and quarrying,' in which the numbers of employees have been constantly decreasing; to put it in numbers, it is 2.1 thousand. The biggest section is 'manufacturing,' which still employed 1 089.0 thousand employees; however, there was a decrease by 50.7 thousand, y-o-y (-4.4%). Table 1 from the News Release has been already since the Q3 2020 showing the most important CZ-NACE divisions of this section – except for manufacture of food products (-2.8%), the decreases are by about five percent; in 'manufacture of other non-metallic mineral products,' it was by 6.3% and in 'manufacture of machinery and equipment' it was by 6.2%.

Significant decreases can be found also in 'transportation and storage' (CZ-NACE H): drop by 10.1 thousand (-3.8%), further in 'professional, scientific and technical activities' (CZ-NACE M): decrease by 6.9 thousand (-3.8%), and, finally, in trade (CZ-NACE G; 'wholesale and retail trade; repair of motor vehicles and motorcycles'), in which the number of employees decreased by 7.2 thousand (-1.4%).

In 'construction' (CZ-NACE F), there was also a decrease (-3.1 thousand; -1.5%). In 'agriculture, forestry and fishing' (CZ-NACE A), there were by 0.4 thousand job positions less, which is by 0.4% less. And, finally, three smaller economic activities: in 'financial and insurance activities,' (CZ-NACE K) there was a decrease by 1.3 thousand (-1.8%); 'arts, entertainment and recreation' (CZ-NACE R) lost 2.8 thousand employees (-5.3%); and 'other service activities' (CZ-NACE S) lost 2.7 thousand (-5.4%).



Average gross monthly wages

According to preliminary results, the average wage (CZK 38 525) increased nominally by CZK 2 363 in the Q4 2020, compared to the corresponding period of 2019, i.e. in relative terms by 6.5%. As for this indicator, we can observe a return to strong growth roughly on the level of the year 2019. A major part of it was driven by payments of bonuses, mainly in 'health'; it stands out especially when compared to the Q2 2020, when the nominal growth of wages was by 0.7% only (a piece of data that remains to be an outlier in the time series).

Expressed in real terms, the wage growth was somewhat weaker – the average wage increased in real terms by 3.8%, which is by 2 p. p. more than in the previous Q3 2020. In the Q2 2020 (the outlier), wages slumped in real terms by 2.3%. The current high figure has been influenced, besides the higher nominal growth, also by lower inflation (consumer price index), which was over the three per cent level up to the Q3 2020; however, in the Q4, it was only 2.6%.

The wage development was also extraordinarily differentiated, see Chart 2, the same as the development in the number of employees. In three CZ-NACE sections, we can find a nominal decrease of the wage level. Conversely, in one economic activity there was an increase by 31%. The mentioned positive extreme is 'human health and social work activities' (CZ-NACE Q), in which the average wage was increased (on an ad-hoc basis) by the so-called covid bonuses for the medical staff (for the spring wave). Moreover, the effect of a change in salary tables as of 1 January 2020 was still felt.

The average wage in 'education' (CZ-NACE P) increased by 10.6%, which is also mainly a result of the change in salary tables. The third highest wage increase – right under the ten percent threshold (9.9%) – can be found in 'administrative and support service activities (CZ-NACE N), where there were massive laying offs and it can be assumed that there was a push out effect, i.e. that it affected rather employees with low wages and therefore the arithmetic mean (average) partially increased only mathematically.

'Information and communication' (CZ-NACE J) is an economic activity, which is successful for a long time; the average wage increased there by 6.5%, year-on-year, to CZK 63 995, which was, with a gap, the highest level of all CZ-NACE sections.

In 'manufacturing' (CZ-NACE C), the average wage reached CZK 36 569, which is an increase by 3.9%. From the selected divisions, 'manufacture of motor vehicles, trailers and semi-trailers' in which wages grew by 5.9% to CZK 43 336, was the most successful.

'Mining and quarrying' (CZ-NACE B) has been slowing down; despite that, wages increased there by 0.8% to CZK 40 291. In 'electricity, gas, steam and air conditioning supply' (CZ-NACE D) by 1.1%, where the average wage of CZK 52 944 was the third highest; in 'water supply; sewerage, waste management and remediation activities' (CZ-NACE E) by 1.3%. In 'construction' (CZ-NACE F), wages of employees increased by 2.8% to CZK 32 857.



As for the biggest economic activities in the sector of services, wages were not growing much in trade (CZ-NACE G; +0.5%). The average wage slightly decreased in 'financial and insurance activities' (CZ-NACE K), by 0.4% (i.e. CZK 211). Despite that, this economic activity still ranks the second best with its wage level; the average wage was CZK 56 735 there. In 'professional, scientific and technical activities,' it increased by 4.4% to CZK 44 983.

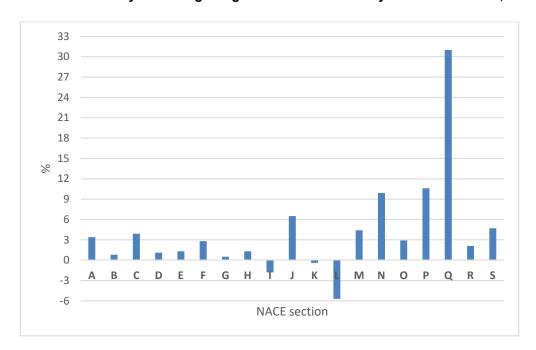


Chart 2: Year-on-year average wage increase/decrease by CZ-NACE section, Q4 2020

Wages were also decreasing in 'accommodation and food service activities' (CZ-NACE I), where, moreover, there were massive laying offs, too. The average wage decreased there by 1.8% to CZK 20 361. This economic activity constantly has the lowest wage level of all CZ-NACE sections.

A decrease of the average wage by 5.7% in 'real estate activities' (CZ-NACE L) is obviously related to the already mentioned increase in the number of employees – it increased by 14.5%; despite that, it is still one of the smallest sections as for the number of employees. Wages in 'arts, entertainment and recreation' (CZ-NACE R) increased by 2.1% and in 'other service activities' (CZ-NACE S) by 4.7%, in both of them with 5% loss of their employees.

Development in Regions

Regional results bring also a varied picture; however, the impacts of the crisis, which is dragging on, on the numbers of employees seem to be nationwide, i.e. there were decreases in all Regions. The span of decreases in Regions, however, ranges from 1.5% in the *Středočeský* Region, 2.5% in Prague, up to 6.6% in the *Karlovarský* Region (the worst one). Roughly a four percent decrease in the number of employees was also in the *Liberecký* Region (-4.2%) and the *Moravskoslezský* Region (-3.9%).



A different situation is in wages – the average wage increased nominally the least in Prague (4.0%), the second weakest growth was in the *Středočeský* Region (5.1%), and the *Zlínský* Region ranked third (5.8%). Conversely, the highest wage increases were in the *Ústecký* Region (9.6%) and the figure over eight percent was in the *Olomoucký* Region (8.3%) followed by the *Královéhradecký* Region (8.2%) and the *Jihočeský* Region (8.1%). The growth in the remaining Regions was ranging from seven to eight percent.

According to the total level of earnings, the Capital City of Prague still continues to be the richest among the Regions of the Czech Republic (CR). The average wage in Prague was CZK 45 944 and the *Středočeský* Region maintained its second position with CZK 38 820. On the other hand, the *Karlovarský* Region remained to be the Region with the lowest wage level (CZK 34 200; growth by 7.9%), closely followed by the *Zlínský* Region (CZK 34 610). In the *Moravskoslezský* Region, wages increased by 7.3% to CZK 35 178.

Results for the whole year 2020 and situation on the labour market

In the year 2020, long-term trends were interrupted; it was an extraordinary situation, which has no parallel in our modern history. The Czech Republic entered the coronavirus crisis with a very low unemployment and quite decent economic growth; there was a high number of job vacancies and of employed persons, too. The increase of labour force was driven mainly by incoming foreigners, because the domestic sources were very exhausted. Assumptions that potential impacts of recession might be born namely by that group of people have not yet proven to be true – in the end of 2020, there were even by 22 thousand more registered foreign nationals in the position of employees compared to the end of 2019.

Cumulative results from reports (questionnaires) of business statistics of the CZSO for the whole year 2020 show a decrease in the registered number of employees by 106.9 thousand, which is by 2.6% in relative terms. The average wage increased by CZK 1 500, which is by 4.4%. However, it depended very much on the economic activity an employee works in. The most affected was the economic activity of 'accommodation and food service activities,' in which the number of job positions decreased by 13.5% and the trend showed that the decrease is deepening. Concurrently, it was one of a few economic activities, in which the average wage decreased (by 2.1%) and thus it returned under the threshold of twenty thousand (CZK 19 841); therefore it remains with a gap on the lowest place.

A year-round decrease in the number of employees was similar (and as for the number it was even more important) in 'administrative and support service activities' (CZ-NACE N), in which employment agencies are dominating (-13.4%; drop by 26.7 thousand). However, the average wage increased by 9.5% there. As put in absolute numbers, the highest decrease in the number of employees was, naturally, in 'manufacturing' (by 48 thousand). The average wage increased by 1.4% there.

From the regional point of view, convergence of wage levels in Regions is remarkable; high wages in Prague and in the *Středočeský* Region are growing slower than the other ones.



According to research agencies, many employees were changing jobs and moving between economic activities. The possibility to work from home office became commonplace in all activities that enable it. Adaptability of both Czech employees and employers seems to be high; however, the risk of short-term and precarious work is increasing.

For economic performance, also extra-economic factors can be important, mainly psychological state. According to data of the National Institute of Mental Health, the occurrence of anxiety disorders doubled and occurrence of depressions tripled, the risk of suicidal behaviour significantly increased, and binge drinking increased by 60% during the year 2020.

Median wages and decile intervals of wages, socio-economic characteristics

The News Release of the CZSO for the Q4 2020 also contains a piece of data on the median wage, which is calculated from a mathematical model of the earnings distribution. The model shows the wage of a middle employee, i.e. a common wage level. Extreme deciles were calculated concurrently, too. In the Q4 2020, the median wage increased to CZK 32 870, which is by CZK 1 678 (i.e. by 5.4%) more than in the corresponding period of the previous year.

The wage interval has widened in the Q4 2020. Ten percent of employees with the lowest wages were receiving a gross wage below CZK 16 356 (the bottom decile increased by 6.5%, y-o-y), whereas the opposite tenth having highest wages earned over CZK 63 781 (the top decile increased by 9.0%). The decile ratio thus increased by 0.1 point, year-on-year; median earnings around the median wage were increasing the slowest.

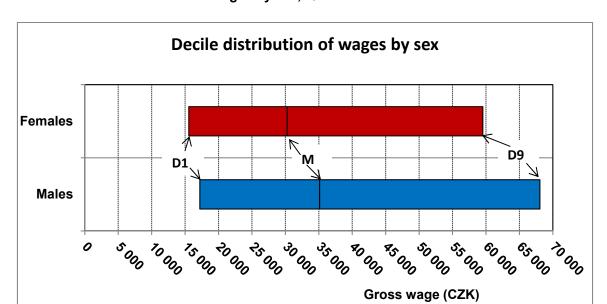


Chart 3: Decile distribution of wages by sex, Q4 2020



Although the female median wages increased more significantly – by 6.5%, year-on-year, on the medians – while the wages of males grew only by 3.8%, the wage level of males was still much higher: in the Q4 2020, the female median wage was CZK 30 281, while the male median wage was CZK 35 129; thus, it was higher by CZK 4 848 (i.e. by 16%). Concurrently, wages of males were distributed over a substantially wider interval, see Chart 3, than wages of females; especially the area of high earnings was considerably higher for males than for females. The top decile for females was CZK 59 533, while for males it was CZK 68 062, by which it was by 14% higher. As for low earnings, the difference was somewhat smaller; the bottom decile for females was CZK 15 548 and for males it was CZK 17 17 199, i.e. by 11% higher.

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Preliminary results from the **Information System on Average Earnings** (ISAE) for the year 2020 bring a more detailed view of wage distributions and socio-economic breakdowns. The ISAE, however, applies a different methodology for the calculation of personal earnings of an employee (first of all, it excludes all absences at work) and therefore these data are not comparable to the aforementioned amounts of the average wages nor to figures given in tables annexed to the News Release of the CZSO.

According to the valid Classification of **Occupations** (CZ-ISCO) managers were the group with highest earnings having the median wage of CZK 65 245. However, their wages are the most differentiated ones; a tenth of the best-paid earned over CZK 148 786, while the opposite tenth got less than CZK 32 513. The second highest wage level can be found in professionals with the median wage of CZK 46 743 and the third rank was occupied by technicians and associate professionals with the median wage of CZK 38 299. Clerical support workers had the median wage of CZK 29 014. A rather significant year-on-year growth of the median wage (by 9.3%) was found in the group of service and sales workers, of which, however, many belong to low-income employees¹ with the decile ranging from CZK 16 728 to CZK 40 994 and their median wage was CZK 25 211. Craft and related trades workers and plant and machine operators and assemblers had their median wages CZK 30 904 and CZK 29 858, respectively; their wages were growing at a slower pace (by 3.1% and 4.1%, respectively). The lowest wage level can be found at elementary occupations with the median wage of CZK 20 767. Among them, the share of low-income employees is over a half; their decile range was between CZK 14 869 and CZK 32 043.

By **age group**, employees up to 20 years of age earned the lowest median wages (CZK 22 652). Concurrently, there were by a fifth less of them in the sample, year-on-year. In the age group of 20–29 years, the median wage was already much higher: CZK 30 565; however, it increased the least, year-on-year (by 4.2%). In the age group of 30–39 years, the median was the highest (CZK 34 924). In the other age groups, wages are slowly decreasing.

¹ In general, such an employee is considered to be a low-income (low-wage) employee who earns less than 2/3 of the total median wage; according to preliminary results of the ISAE for the year 2020, the threshold was CZK 22 183.



Wages are also highly structured by the **educational attainment** of an employee; also in 2020, employees with higher education had the highest earnings, their median wage was CZK 47 724. Conversely, wages of employees with primary education or with incomplete primary education remained the lowest (25 441 Kč). Graduates of secondary schools with an A-level examination earned much more (CZK 34 122) than those without the A-level examination (CZK 28 297), but less than employees with higher professional education or graduates from bachelor study programmes (CZK 39 771).

As for big groups of foreigners, median wages in Czechia are high above standard among Slovaks (CZK 36 824) – they were by 10% higher than among employees with Czech nationality – whereas Ukrainians have wages by 23% lower (CZK 25 857), wages of Bulgarians were by 15% lower, and those of Romanians were by 11% lower.

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