



FOOD SECURITY IN UKRAINE IN THE SIX MONTHS OF WAR

18 October, 2022

PREVIEW

After six months of war, decline in food affordability in Ukraine ranges from 15% to 43%. Increased consumer prices and unemployment are to blame.

In this report we present the overview of the Food Affordability Index (FAI) since the beginning of the full-scale military invasion of RF. FAI is estimated as a ratio of the average salary to the price of the basket of food products. Whereas data on commodity prices are available and consistent, data on change in salaries is limited. Therefore, in this issue we look at FAI with respect to income variability, and report possible minimum and maximum changes of the index.

INCOME VARIABILITY

We consider four different scenarios of income change in Ukraine. In the first scenario, income data is based on survey of CEO's by KSE¹. The second scenario uses average salary estimated from the data web-scraped from the Ukrainian job search website². On average, this salary is 40% higher than the one of the first scenario, because it does not include unemployment. The third scenario adjusts the average salary of scenario 2 to the war-caused unemployment and the consequent social security payments estimated by Gradus³. The fourth scenario is scenario three with the addition of the coefficient of income change due to people switching to

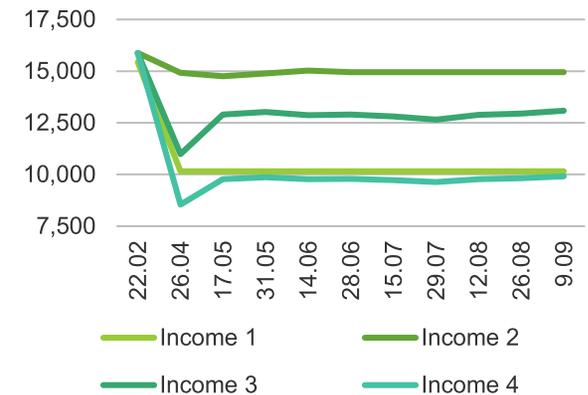
part-time employment or paid leave with lower compensation.

FAI ESTIMATES

Before the RF's full-scale invasion, the FAI score was 12.8, implying that the person with an average salary could buy 12.8 months' worth of food products from our food basket. After February 24, FAI decreased significantly, because both, consumer prices and income, declined. The prices for food grew by 4-26% depending on the month, and average monthly consumer's income decreased by 6.0-39.1% depending on the income scenario.

Monthly changes of FAI reflect seasonality of prices and war-related developments. In April, when FAI was first estimated, the change in the latter ranged from at least -11.24% (income scenario 2) to the maximum of -49.16% (for income scenario 4). With liberation of the northern regions and the firefights stabilizing at the south-east of Ukraine, FAI improved. In June, however, seasonal factors brought vegetable prices up which decreased FAI: lower range of the estimate was -25.1%, and upper range -50.9%. In July, this year's vegetables harvest arrived at the stores, and the respective prices dropped. This led to the improvement of FAI. As of September 9, FAI reached the May level: -14.68% at the upper range and -43.42% at the lower range.

	FAI		Change in FAI		Change in prices
	Lower value	Upper value	Lower range	Upper range	
21.02	12.80	12.80	0.00%	0.00%	0%
22.04	6.51	11.36	-49.16%	-11.24%	+5.8%
13.05	7.55	11.39	-41.02%	-11.04%	+4.4%
27.05	7.43	11.22	-41.91%	-12.33%	+7%
17.06	7.13	10.96	-44.32%	-14.41%	+10.6%
01.07	6.28	9.59	-50.93%	-25.09%	+25.7%
15.07	6.57	10.09	-48.70%	-21.17%	+19.4%
29.07	6.78	10.52	-47.03%	-17.82%	+14.5%
26.07	7.02	10.67	-45.17%	-16.61%	+12.9%
09.09	7.24	10.92	-43.42%	-14.68%	+10.3%



Note: vertical axis indicates the value of income
Source: own estimations, based on data from State Statistics Service of Ukraine, surveys by Gradus and KSE, and web-scraped data from Ukrainian job-search website.

¹ Food Security and Policy Review in Ukraine. Foreword to the series & methodology. https://kse.ua/wp-content/uploads/2022/07/Foreword-to-the-series-and-methodology_eng.pdf

² Since the last date for which the salary data is available is June 30, we use the last available salary estimates for July-September as well.

³ Міграція та соціально-політичні настрої під час повномасштабної війни Росії проти України. https://gradus.app/documents/295/Gradus_EU_wave_9_UA.pdf