

# رصد ومتابعة مستوى الأمن الغذائي في الدول العربية : المقاربات العالمية لرصد الأمن الغذائي

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قسم سياسات الغذاء والبيئة – إدارة سياسات التنمية المستدامة

اللجنة الاقتصادية والاجتماعية لغربي آسيا

اجتماع نقاط الاتصال الوطنية لمشروع تعزيز الأمن الغذائي والمائي في المنطقة العربية  
بيت الأمم المتحدة – بيروت ، 5-6 تشرين الأول/أكتوبر 2016



الأمم المتحدة

الاستسها

ESCWA

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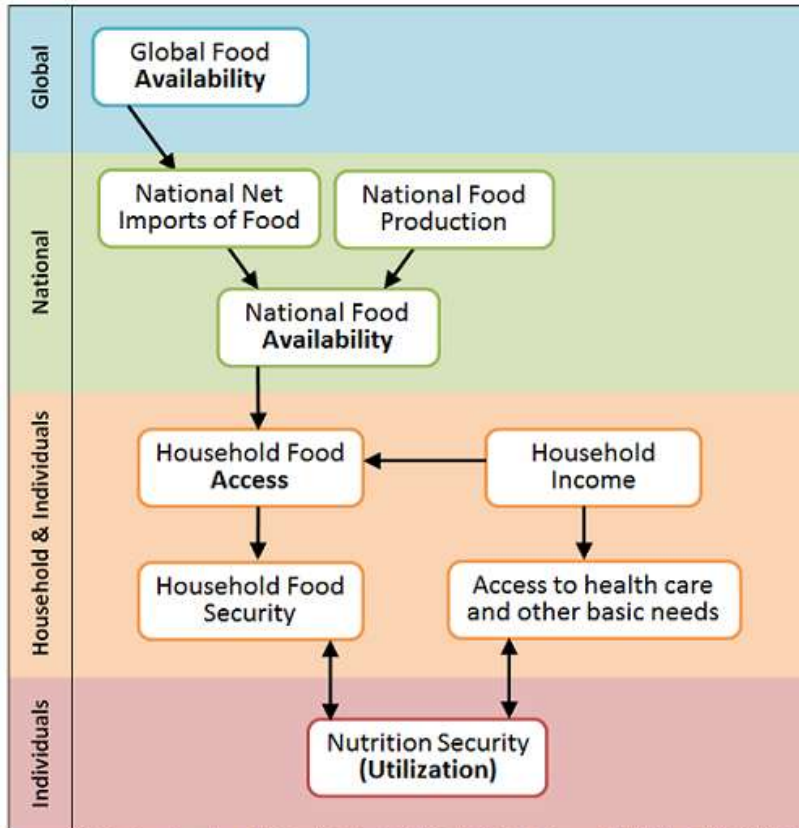
## مفهوم الأمن الغذائي، أبعاده ومستوياته

### الأمن الغذائي:

يتحقق الأمن الغذائي عندما ”تتوافر لجميع الناس، وفي كل الأوقات،  
الإمكانات المادية (الحسية) والإقتصادية؛ للحصول على غذاءٍ كافٍ  
وآمن ومغذٍّ؛ يلبي إحتياجاتهم الغذائية ويناسب أذواقهم؛ ليعيشوا حياة  
مفعمة بالنشاط والصحة“. (قمة الغذاء العالمي ، 1996)

# مفهوم الأمن الغذائي، أبعاده ومستوياته

## مستويات الأمن الغذائي:



## أبعاد الأمن الغذائي (FAO):

- توافر الغذاء
- الوصول إلى الغذاء (مادياً وإقتصادياً)
- الاستفادة من الغذاء
- إستقرار توفر الغذاء



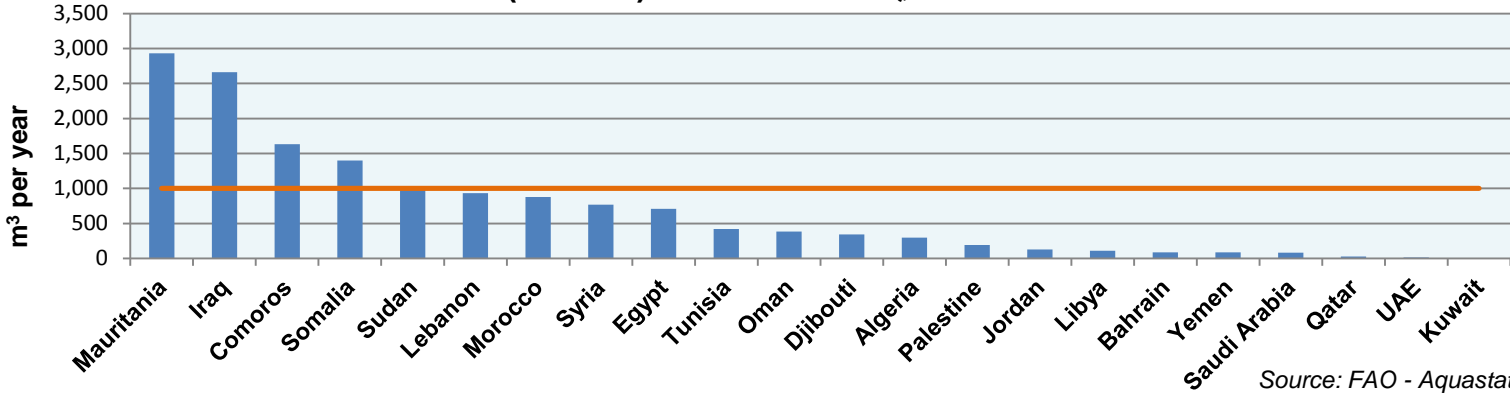
Source: Martin Van Ittersum & Ken Giller, 2014

Adapted from Perez-Escamilla & Segall-Corréa (2008), FAO (2003), Frankenberger et al. (1997), and UNICEF (1990)

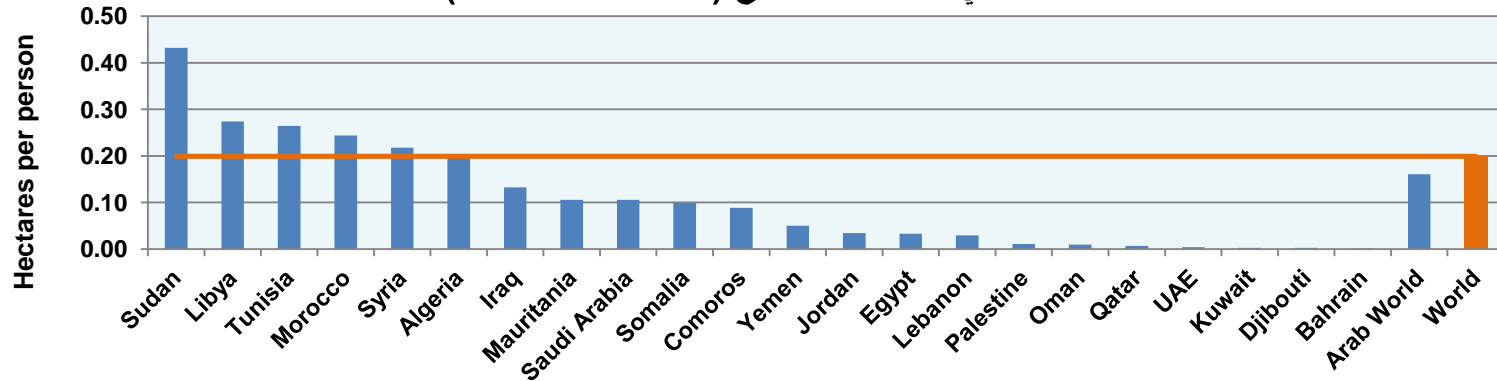
# تحديات الأمن الغذائي – عوامل طبيعية – شح المياه والأراضي

مستويات منخفضة جداً من هطول الأمطار (على المستوى الوطني)  
(11 دولة عربية هي الأدنى من بين 180 دولة، و20 دولة عربية ضمن أدنى 32 دولة - 2014) (FAO)

نصيب الفرد السنوي من المياه المتجددة (متر مكعب) - 2014

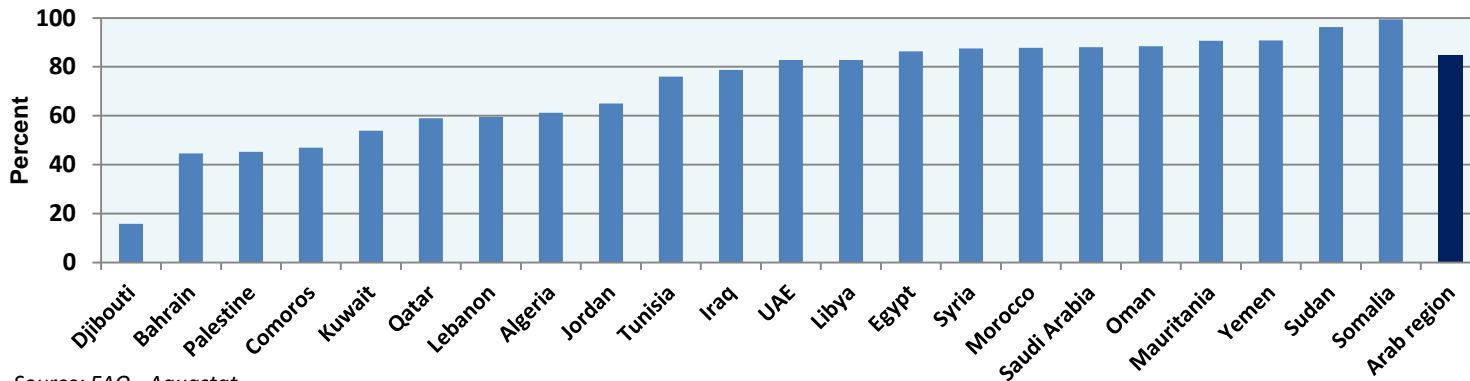


توفر الأراضي القابلة للاستصلاح (هكتار للفرد - 2012)



# تحديات الأمن الغذائي - إدارة المياه

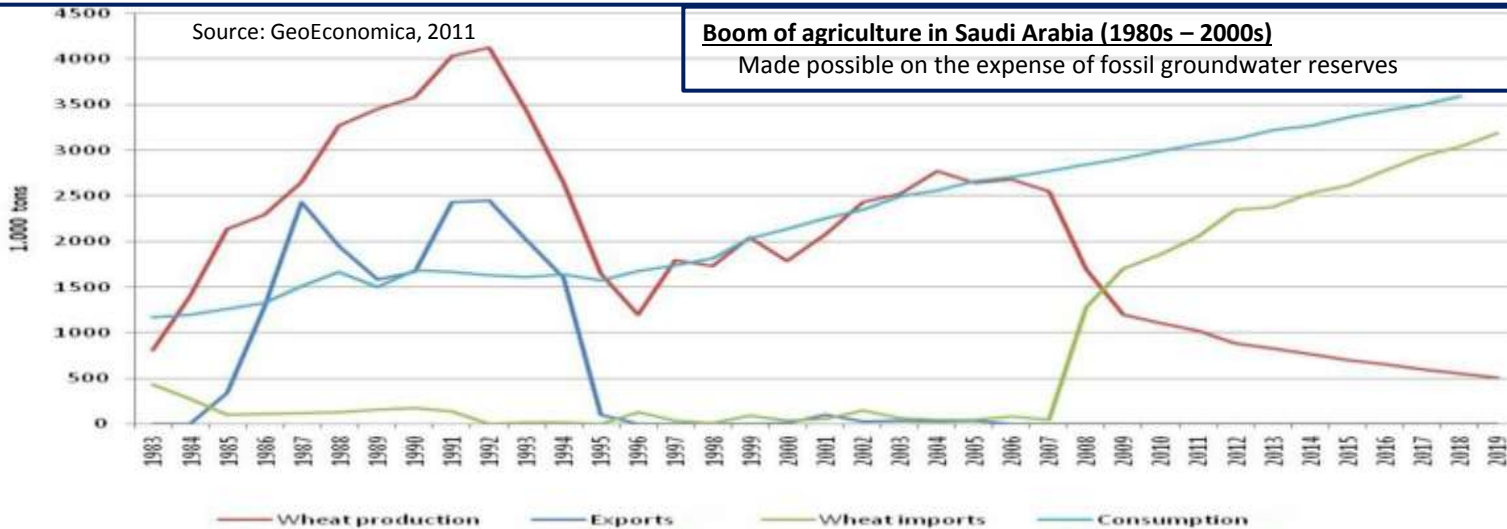
سحب المياه للزراعة كنسبة من إجمالي السحب (%) - (2010-2005)



Source: FAO - Aquastat

Boom of agriculture in Saudi Arabia (1980s – 2000s)

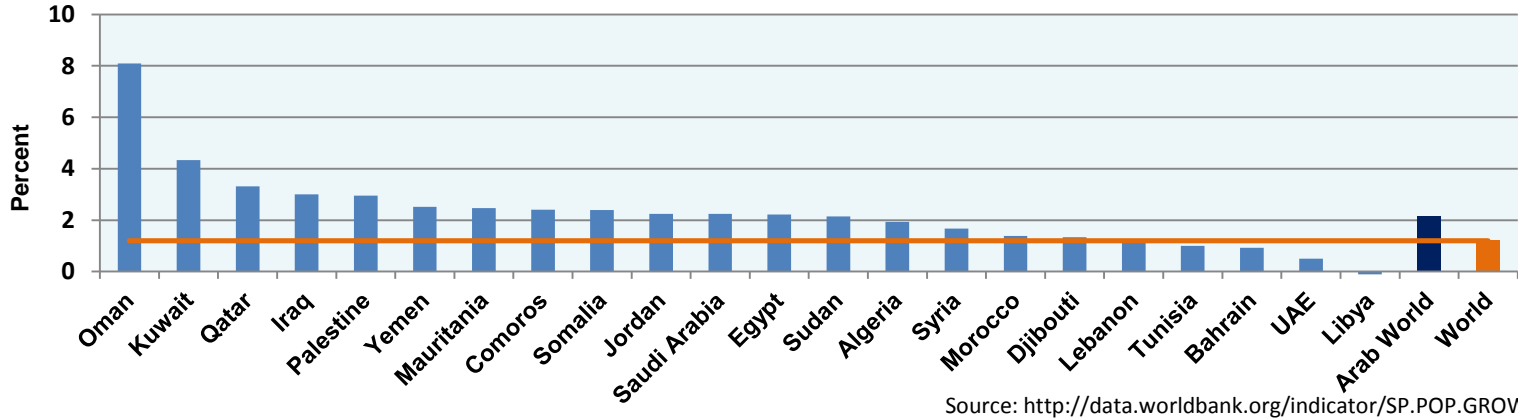
Made possible on the expense of fossil groundwater reserves



Source: GeoEconomic, 2011

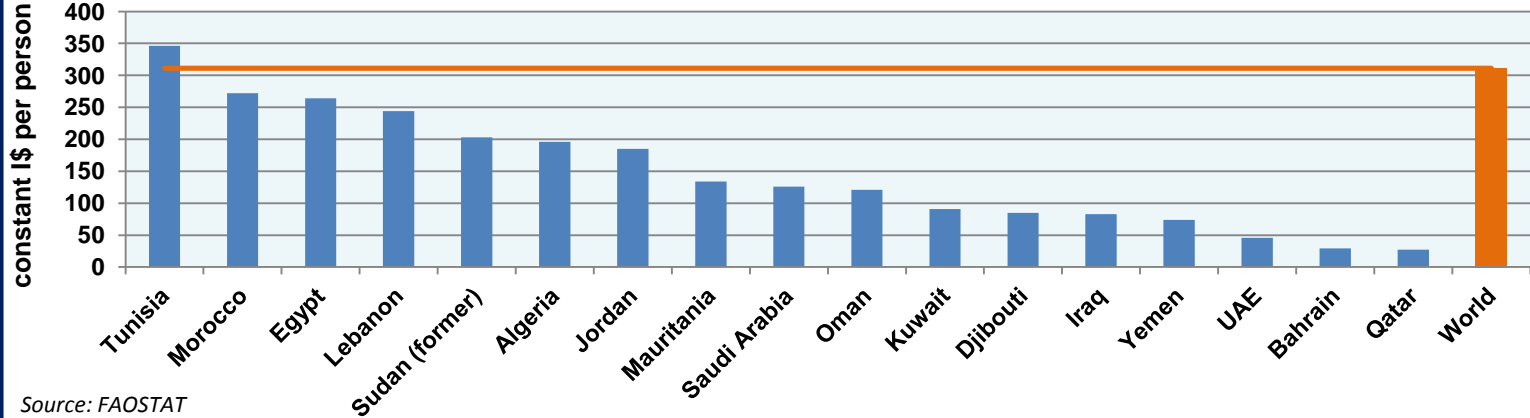
## تحديات الأمن الغذائي – عوامل إجتماعية وإقتصادية

النمو السكاني (معدل سنوي – 2014)



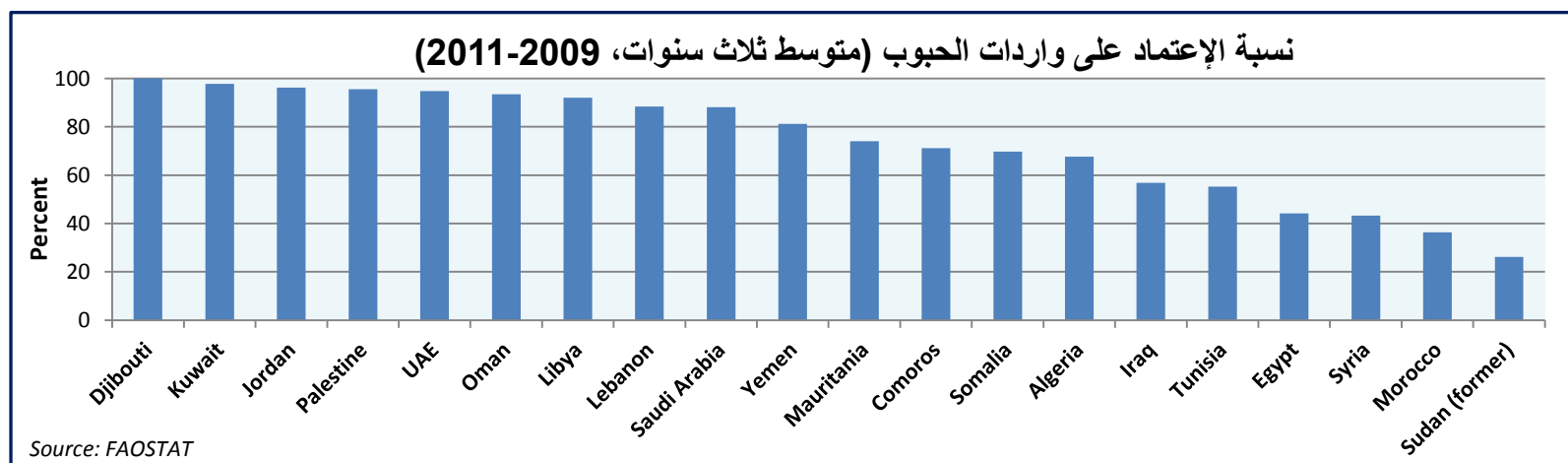
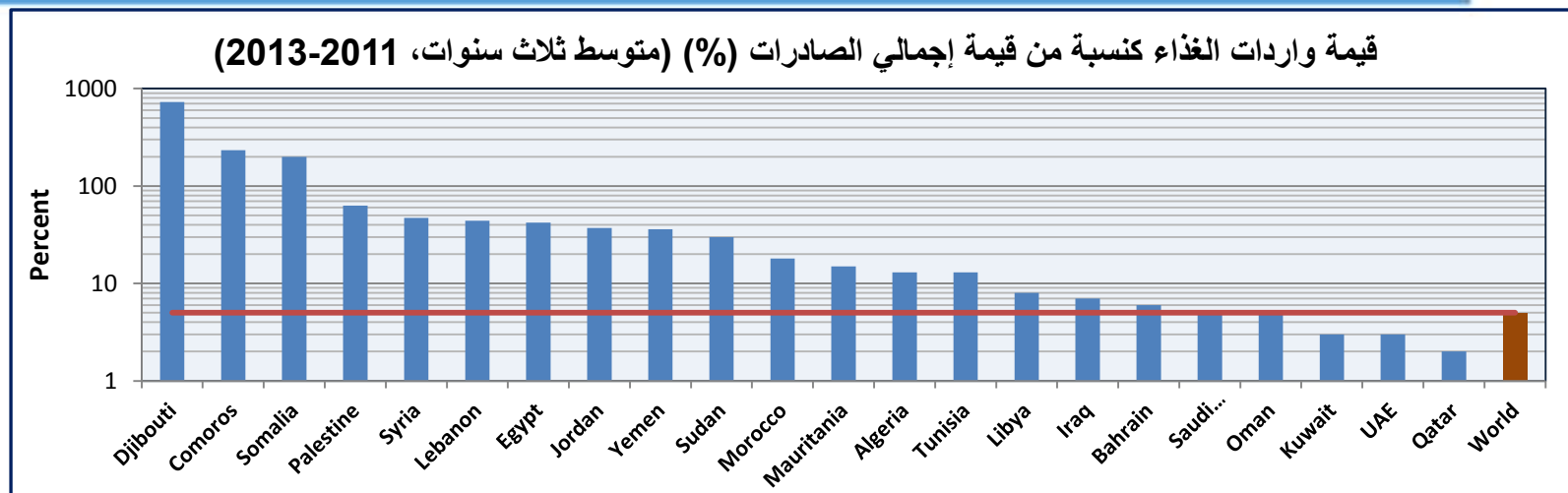
Source: <http://data.worldbank.org/indicator/SP.POP.GROW>

متوسط قيمة المنتج من الغذاء (متوسط 3 سنوات 2011-2013)



Source: FAOSTAT

## تحديات الأمن الغذائي – عوامل إجتماعية وإقتصادية



Source: FAOSTAT



## تحديات الأمن الغذائي – عوامل إجتماعية وإقتصادية

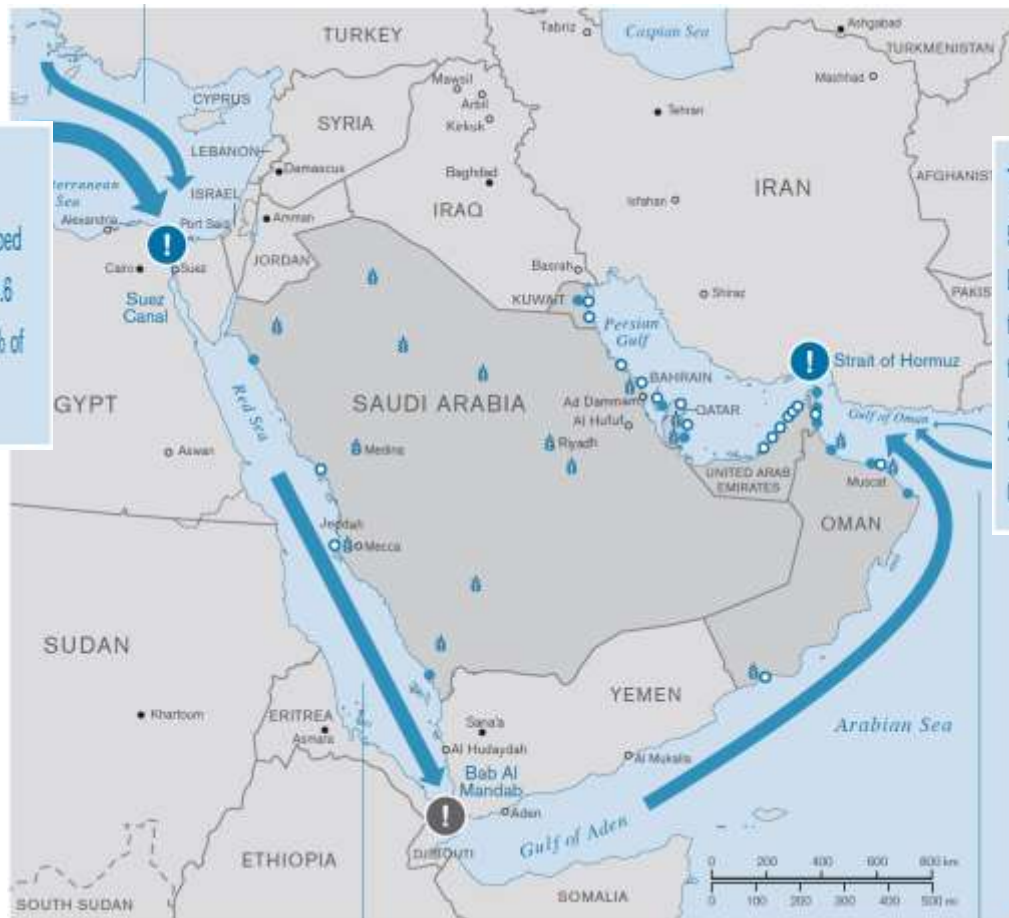
Country	Water Withdrawal per 1,000 US\$ GDP (m <sup>3</sup> )				Water withdrawal (% of Total withdrawal)		Value added (% of GDP)	
	Agriculture		(2011)	Industry (2011)	Agriculture (2011)	Industry (2011)	Agriculture (2011)	Industry (2011)
	(1992)	(2002)						
Algeria	502.2	752.5	242.9	8.4	64.0	13.5	8.3	50.9
Egypt	-	4,359.4	1,802.5	47.1	86.4	5.9	14.5	37.6
Jordan	2,028.4	3,508.6	725.3	4.9	65.0	4.1	3.3	31.1
Lebanon	-	848.3	372.1	20.5	59.5	11.5	5.9	20.6
Morocco	2,325.9	1,853.7	775.4	13.0	87.3	2.9	15.5	30.2
Saudi Arabia	1,991.8	1,590.3	1,621.8	1.7	88.0	3.0	1.9	63.8
Sudan	5,490.1	6,052.6	2,377.6	12.8	97.1	0.6	24.5	28.1
Tunisia	1,091.9	1,127.3	569.5	8.2	76.0	3.9	8.9	31.3
...								

Data compiled from FAO and World Bank

### Wheat import in the Arab region

	2000	2005	2010
Net import of wheat (tonne), (FAOSTAT)	19,668,199	21,029,978	29,200,865
Net import of wheat (1000 USD), (FAOSTAT)	2,886,844	2,855,762	6,687,080
Virtual-water flows related to trade in crops - net import (1996-2005) (Hoekstra and Mekonnen, 2011)	<b>73,870.9 Mm<sup>3</sup>/yr</b>		

# تحديات الأمن الغذائي – عوامل جيوسياسية



## Transiting Suez Canal

7.5 million tonnes of wheat and coarse grains are shipped from North America, South America and Europe, and 4.6 million tonnes from the Black Sea. This represents 81% of total imports of these commodities to the GCC.

## Transiting Strait of Hormuz

5.2 million tonnes of wheat and coarse grains from North America, South America, Europe and the Black Sea are shipped on through the Strait of Hormuz to Kuwait, the UAE, Qatar, Bahrain and eastern ports in Saudi Arabia. This represents 35% of total imports of these commodities to the GCC.

2.5 million tonnes of rice from South and Southeast Asia (81% of total rice imports).

0.7 million tonnes of wheat from Australia.

- تأمين خطوط إمداد الغذاء
- حظر تصدير الغذاء
- لاسباب طبيعية أو سياسية
- ...

## Transiting Bab Al Mandab

5.8 million tonnes of imports of wheat and coarse grains from North America, South America, Europe and the Black Sea are shipped on from Suez to Kuwait, UAE, Qatar, Bahrain, Oman and eastern ports in Saudi Arabia. This represents 39% of total imports of these commodities to the GCC.

Source: Rob Bailey and Robin Willoughby, 2013



Choke point (high risk)



Primary port



Secondary port



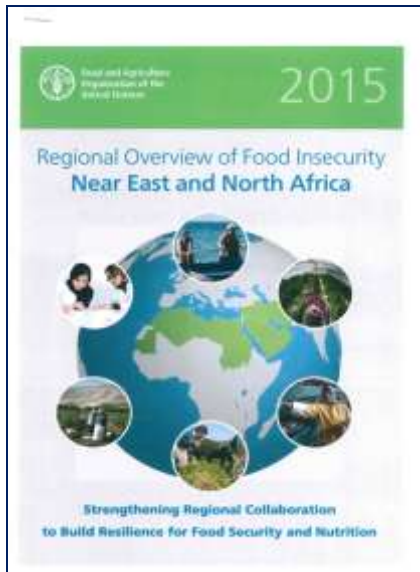
Grain silo

Scale:

1 million tonnes  
of 2010 cereal  
imports

5 million tonnes  
of 2010 cereal  
imports

# FAO - قياس الأمن الغذائي



FOOD SECURITY INDICATORS	DIMENSION	
Average dietary energy supply adequacy Average value of food production Share of dietary energy supply derived from cereals, roots and tubers Average protein supply Average supply of protein of animal origin	AVAILABILITY	STATIC and DYNAMIC DETERMINANTS
Percentage of paved roads over total roads Road density Rail lines density	PHYSICAL ACCESS	
Domestic food price index	ECONOMIC ACCESS	
Access to improved water sources Access to improved sanitation facilities	UTILIZATION	
Cereal import dependency ratio Percentage of arable land equipped for irrigation Value of food imports over total merchandise exports	VULNERABILITY	
Political stability and absence of violence/terrorism Domestic food price volatility Per capita food production variability Per capita food supply variability	SHOCKS	ACCESS
Prevalence of undernourishment Share of food expenditure of the poor Depth of the food deficit Prevalence of food inadequacy	ACCESS	
Percentage of children under 5 years of age affected by wasting Percentage of children under 5 years of age who are stunted Percentage of children under 5 years of age who are underweight Percentage of adults who are underweight Prevalence of anaemia among pregnant women Prevalence of anaemia among children under 5 years of age Prevalence of vitamin A deficiency (forthcoming) Prevalence of iodine deficiency (forthcoming)	UTILIZATION	

Note: Values and detailed descriptions and metadata for these indicators are available on the companion website ([www.fao.org/publications/sofi/en/](http://www.fao.org/publications/sofi/en/)).

Source: FAO.

## قياس الأمن الغذائي - تقارير أوضاع الأمن الغذائي العربي



- شمولية القياس لجميع أبعاد الأمن الغذائي
- المؤشرات المستخدمة ومفهوم الأمن الغذائي (عربياً أو عالمياً)
- تركيز على الإنتاج
- البيانات التفصيلية على المستوى الوطني
- **مستجدات أهداف التنمية المستدامة**

## IFPRI (Yu et al. 2010) – قياس الأمن الغذائي

Food Security level	Criteria		Low Soil Fertility		High Soil Fertility	
			Unfavorable Climate	Favorable Climate	Unfavorable Climate	Favorable Climate
Lowest Food Security	Trade insecure	Low food production	Yemen	--	--	Comoros
	Trade secure	Low food production	--	--	--	--
Low Food security	Trade insecure	Low food production	Djibouti, Palestine, Sudan	--	--	--
	Trade secure	Low food production	--	--	--	--
Middle Food Security	Trade insecure	High food production	--	--	--	--
		Low food production	Jordan	--	--	--
	Trade secure	High food production	--	--	--	--
		Low food production	--	--	--	--
Upper-Middle Food Security	Trade insecure	High food production	Lebanon	--	Syria	--
		Low food production	Algeria, Egypt, Mauritania, Saudi Arabia	--	Morocco	--
	Trade secure	High food production	--	--	--	--
		Low food production	Kuwait, Libya, Tunisia	--	--	--
High Food Security	Trade insecure	High food production	--	--	--	--
		Low food production	--	--	--	--
	Trade secure	High food production	--	--	--	--
		Low food production	United Arab Emirates	--	--	--



# قياس الأمن الغذائي - أهداف التنمية المستدامة (SDGs)

## الهدف (2) القضاء على الجوع وتوفير الأمن الغذائي والتغذية المحسنة وتعزيز الزراعة المستدامة

<p><b>1-1-2</b> معدل انتشار نقص التغذية.</p> <p><b>2-1-2</b> معدل انتشار انعدام الأمن الغذائي المتوسط أو الشديد وسط السكان، استنادا الى مقياس المعاناة من انعدام الأمن الغذائي.</p>	<p><b>1-2</b> القضاء على الجوع وضمان حصول الجميع، ولاسيما الفقراء والفئات الضعيفة، بمن فيهم الرضع، على ما يكفيهم من الغذاء المأمون والمغذي طوال العام بحلول العام 2030.</p>
<p><b>1-2-2</b> معدل انتشار توقف النمو (الطول بالنسبة للعمر &gt; 2- نقطة من الانحراف المعياري عن متوسط معايير نمو الطفل لمنظمة الصحة العالمية) بين الأطفال دون سن الخامسة.</p> <p><b>2-2-2</b> معدل انتشار سوء التغذية (الوزن بالنسبة للطول &lt; 2+ أو &gt; 2- نقطة من الانحراف المعياري عن متوسط معايير نمو الطفل لمنظمة الصحة العالمية) بين الأطفال دون سن الخامسة، مصنفا حسب النوع (الهزال وزيادة الوزن).</p>	<p><b>2-2</b> وضع نهاية لجميع أنواع سوء التغذية، بحلول عام 2030، بما في ذلك تحقيق الأهداف المتفق عليها دوليا بشأن توقف النمو والهزال لدى الأطفال دون سن الخامسة، ومعالجة الاحتياجات التغذوية للمراهقات والحوامل والمرضع وكبار السن بحلول عام 2025.</p>
<p><b>1-3-2</b> حجم الإنتاج لكل وحدة عمل حسب فئات حجم المؤسسة الزراعية/الرعية/الحرثية.</p> <p><b>2-3-2</b> *الإنتاجية الإجمالية لعوامل الإنتاج.</p>	<p><b>3-2</b> مضاعفة الإنتاجية الزراعية ودخل صغار منتجي الأغذية، ولاسيما النساء وأفراد الشعوب الأصلية والمزارعون الأسريون والرعاة والصيادون، بما في ذلك ضمان المساواة في حصولهم على الأراضي وعلى موارد الإنتاج الأخرى والمدخلات والمعارف والخدمات المالية وامكانية وصولهم الى الأسواق وحصولهم على الفرص لتحقيق قيمة مضافة وحصولهم على فرص عمل غير زراعية، بحلول عام 2030.</p>
<p><b>1-4-2</b> *النسبة المئوية للمساحة الزراعية الخاضعة للممارسات الزراعية المستدامة.</p> <p><b>2-4-2</b> *النسبة المئوية للأسر المعيشية الزراعية التي تستخدم نظم الري مقارنة بجميع الأسر المعيشية الزراعية.</p> <p><b>3-4-2</b> *النسبة المئوية للأسر المعيشية الزراعية التي تستخدم أسمدة مراعية للبيئة مقارنة بجميع الأسر المعيشية الزراعية التي تستخدم الأسمدة.</p>	<p><b>4-2</b> ضمان وجود نظم إنتاج غذائي مستدامة، وتنفيذ ممارسات زراعية متينة تؤدي الى زيادة الإنتاجية والمحاصيل، وتساعد على الحفاظ على النظم الإيكولوجية، وتعزيز القدرة على التكيف مع تغير المناخ وعلى مواجهة أحوال الطقس الشديدة وحالات الجفاف والفيضانات وغيرها من الكوارث، وتحسن تدريجيا نوعية الأراضي والتربة، بحلول عام 2030.</p>
<p><b>1-5-2</b> *مؤشر تخصيص مجموعات المحاصيل خارج مواقعها.</p> <p><b>2-5-2</b> *النسبة المئوية للمحاصيل والسلالات المحلية وما يتصل بها من الأنواع البرية، التي تصنف على أنها معرضة للخطر أو غير معرضة للخطر أو تقف عند مستوى غير معروف لخطر انقراضها.</p>	<p><b>5-2</b> الحفاظ على التنوع الحيوي للنباتات المزروعة والحيوانات المدجنة والأليفة وما يتصل بها من الأنواع البرية، بما في ذلك من خلال بنوك البذور والنباتات المتنوعة التي تدار ادارة سليمة على كل من الصعيد الوطني والإقليمي والدولي، وضمان الوصول اليها وتقاسم المنافع الناشئة عن استخدام الموارد الجينية وما يتصل بها من معارف تقليدية بعدل وانصاف على النحو المتفق عليه دوليا، بحلول عام 2020.</p>
<p><b>2-أ-1</b> *مؤشر التوجه الزراعي للنفقات الحكومية</p>	<p><b>2-أ</b> زيادة الاستثمار، بما في ذلك عن طريق التعاون الدولي المعزز، في البنى التحتية الريفية، والبحوث الزراعية وخدمات الإرشاد الزراعي، وفي تطوير التكنولوجيا وبنوك الجينات الحيوانية والنباتية من أجل تعزيز القدرة الإنتاجية الزراعية في البلدان النامية، ولاسيما في أقل البلدان نموا</p>
<p><b>2-ب-1</b> *النسبة المئوية للتغير في تعريفات الاستيراد والتصدير المفروضة على المنتجات الزراعية.</p> <p><b>2-ب-2</b> اعانات الصادرات الزراعية.</p>	<p><b>2-ب</b> منع القيود المفروضة على التجارة وتصحيح التشوهات في الأسواق الزراعية العالمية، بما في ذلك عن طريق الإلغاء الموازي لجميع أشكال اعانات الصادرات الزراعية، وجميع تدابير التصدير ذات الأثر المماثل، وفقا لتكليف جولة الدوحة الإنمائية.</p>
<p><b>2-ج-1</b> *مؤشر مفارقات أسعار ( الغذاء)</p>	<p><b>2-ج</b> اعتماد تدابير لضمان سلامة أداء أسواق السلع الأساسية ومشتقاتها وتيسير الوصول على المعلومات عن الأسواق في الوقت المناسب، بما في ذلك عن الاحتياطات من الأغذية، وذلك للمساعدة على الحد من شدة تقلب أسعارها</p>

## قياس الأمن الغذائي -

### بُعد/محور توافر الغذاء في أهداف التنمية المستدامة (SDGs)

Food Security Dimension	FAO indicators	SD targets	Proposed indicators
<b>Availability</b>  <b>توافر الغذاء</b>	<ul style="list-style-type: none"> <li>• Average dietary energy supply adequacy.</li> <li>• Average value of food production.</li> <li>• Share of dietary energy supply derived from cereals, roots and tubers.</li> <li>• Average protein supply.</li> <li>• Average supply of protein of animal origin.</li> </ul>	<p>2.3 By 2030, double the agricultural productivity and incomes of small-scale food producers, in particular women, indigenous peoples, family farmers, pastoralists and fishers, including through secure and equal access to land, other productive resources and inputs, knowledge, financial services, markets and opportunities for value addition and non-farm employment. (+economic access)</p> <p>2.4 By 2030, ensure sustainable food production systems and implement resilient agricultural practices that increase productivity and production, that help maintain ecosystems, that strengthen capacity for adaptation to climate change, extreme weather, drought, flooding and other disasters and that progressively improve land and soil quality. (+stability)</p> <p>2.a Increase investment, including through enhanced international cooperation, in rural infrastructure, agricultural research and extension services, technology development and plant and livestock gene banks in order to enhance agricultural productive capacity in developing countries, in particular least developed countries.</p> <p>2.b Correct and prevent trade restrictions and distortions in world agricultural markets, including through the parallel elimination of all forms of agricultural export subsidies and all export measures with equivalent effect, in accordance with the mandate of the Doha Development Round.</p> <p>2.c Adopt measures to ensure the proper functioning of food commodity markets and their derivatives and facilitate timely access to market information, including on food reserves, in order to help limit extreme food price volatility.</p> <p>6.3 By 2030, improve water quality by reducing pollution, eliminating dumping and minimizing release of hazardous chemicals and materials, halving the proportion of untreated wastewater and substantially increasing recycling and safe reuse globally.</p> <p>6.4 By 2030, substantially increase water-use efficiency across all sectors and ensure sustainable withdrawals and supply of freshwater to address water scarcity and substantially reduce the number of people suffering from water scarcity.</p> <p>8.4 Improve progressively, through 2030, global resource efficiency in consumption and production and endeavour to decouple economic growth from environmental degradation, in accordance with the 10-Year Framework of Programmes on Sustainable Consumption and Production, with developed countries taking the lead.</p> <p>12.3 By 2030, halve per capita global food waste at the retail and consumer levels and reduce food losses along production and supply chains, including postharvest losses.</p> <p>15.3 By 2030, combat desertification, restore degraded land and soil, including land affected by desertification, drought and floods, and strive to achieve a land degradation-neutral world.</p> <p>17.10 Promote a universal, rules-based, open, non-discriminatory and equitable multilateral trading system under the World Trade Organization, including through the conclusion of negotiations under its Doha Development Agenda.</p>	<p>2.3.1 Volume of production per labour unit by classes of farming/pastoral/forestry enterprise size.</p> <p>2.3.2* Total Factor Productivity.</p> <p>2.4.1* Percentage of agricultural area under sustainable agricultural practices.</p> <p>2.4.2* Percentage of agricultural households using irrigation systems compared to all agricultural households.</p> <p>2.4.3* Percentage of agricultural households using eco-friendly fertilizers compared to all agricultural households using fertilizers.</p> <p>2.a.1* The agriculture orientation index for government expenditures.</p> <p>2.b.1* Percentage change in import and export tariffs on agricultural products.</p> <p>2.b.2 Agricultural export subsidies.</p> <p>2.c.1* Indicator of (food) price anomalies.</p> <p>6.3.1 Percentage of wastewater safely treated.</p> <p>6.3.2 Percentage of bodies of water with good ambient water quality.</p> <p>6.4.1* Percentage change in water use efficiency over time.</p> <p>6.4.2* Percentage of total available water resources used, taking environmental water requirements into account (level of water stress).</p> <p>8.4.1* Resource productivity.</p> <p>12.3.1 Global food loss index.</p> <p>15.3.1* Percentage of land that is degraded over total land area.</p> <p>17.10.1 Worldwide weighted tariff-average.</p>
<b>Availability</b>	<b>5 indicators (FAO)</b>	<b>11 SD targets</b>	<b>17 indicators</b>

## قياس الأمن الغذائي –

### بُعد/محور الوصول للغذاء في أهداف التنمية المستدامة (SDGs)

<p><b>Access (physical &amp; economic)</b></p> <p>الوصول إلى الغذاء (حسياً واقتصادياً)</p>	<ul style="list-style-type: none"> <li>• Percent of paved roads over total roads.</li> <li>• Road density.</li> <li>• Rail lines density.</li> <li>• Gross domestic product per capita (in purchasing power equivalent).</li> <li>• Domestic food price index.</li> <li>• Prevalence of undernourishment.</li> <li>• Share of food expenditure of the poor.</li> <li>• Depth of the food deficit.</li> <li>• Prevalence of food inadequacy.</li> </ul>	1.1 By 2030, eradicate extreme poverty for all people everywhere, currently measured as people living on less than \$1.25 a day.	1.1.1 Proportion of the population below the international poverty line, disaggregated by sex, age group, employment status and geographical location (urban/rural).
		1.2 By 2030, reduce at least by half the proportion of men, women and children of all ages living in poverty in all its dimensions according to national definitions.	1.2.1 Proportion of the population living below the national poverty line, disaggregated by sex and age group. 1.2.2 Proportion of men, women and children of all ages living in poverty in all its dimensions according to national definitions.
		2.1 By 2030, end hunger and ensure access by all people, in particular the poor and people in vulnerable situations, including infants, to safe, nutritious and sufficient food all year round.	2.1.1 Prevalence of undernourishment 2.1.2 Prevalence of moderate or severe food insecurity in the population, based on the Food Insecurity Experience Scale (FIES).
		9.1 Develop quality, reliable, sustainable and resilient infrastructure, including regional and transborder infrastructure, to support economic development and human well-being, with a focus on affordable and equitable access for all.	9.1.1 Share of the rural population who live within 2 km of an all-season road.
		10.1 By 2030, progressively achieve and sustain income growth of the bottom 40 per cent of the population at a rate higher than the national average.	10.1.1 Growth rates of household expenditure or income per capita among the bottom 40 per cent of the population and the total population.
		10.4 Adopt policies, especially fiscal, wage and social protection policies, and progressively achieve greater equality.	10.4.1 Labour share of GDP, comprising wages and social protection transfers.
		14.b Provide access for small-scale artisanal fishers to marine resources and markets.	14.b.1* Proportion of national fishery production by country that are catches by small-medium fishery businesses, or Progress by countries in adopting and implementing a legal/regulatory/policy/institutional framework which recognizes and protects access rights for small-scale fisheries.
<b>Access</b>	<b>9 indicators (FAO)</b>	<b>7 SD targets</b>	<b>9 indicators</b>



## قياس الأمن الغذائي -

### بُعد/محور الانتفاع من الغذاء في أهداف التنمية المستدامة (SDGs)

<p><b>Utilization</b></p> <p>الانتفاع من الغذاء</p>	<ul style="list-style-type: none"> <li>• Access to improved water sources.</li> <li>• Access to improved sanitation facilities.</li> <li>• Percentage of children under 5 years of age affected by wasting.</li> <li>• Percentage of children under 5 years of age who are stunted.</li> <li>• Percentage of children under 5 years of age who are underweight.</li> <li>• Percentage of adults who are underweight.</li> <li>• Prevalence of anaemia among pregnant women.</li> <li>• Prevalence of anaemia among children under 5 years of age.</li> <li>• Prevalence of vitamin A deficiency in the population.</li> <li>• Prevalence of school-age children (6-12 years) with insufficient iodine intake.</li> </ul>	<p>2.2 By 2030, end all forms of malnutrition, including achieving, by 2025, the internationally agreed targets on stunting and wasting in children under 5 years of age, and address the nutritional needs of adolescent girls, pregnant and lactating women and older persons.</p> <p>3.8 Achieve universal health coverage, including financial risk protection, access to quality essential health-care services and access to safe, effective, quality and affordable essential medicines and vaccines for all.</p> <p>6.1 By 2030, achieve universal and equitable access to safe and affordable drinking water for all.</p> <p>6.2 By 2030, achieve access to adequate and equitable sanitation and hygiene for all and end open defecation, paying special attention to the needs of women and girls and those in vulnerable situations.</p>	<p>2.2.1 Prevalence of stunting (height for age &lt;-2 standard deviation from the median of the World Health Organization (WHO) Child Growth Standards) among children under 5 years of age.</p> <p>2.2.2 Prevalence of malnutrition (weight for height &gt;+2 or &lt;-2 standard deviation from the median of the WHO Child Growth Standards) among children under 5, disaggregated by type (wasting and overweight).</p> <p>3.8.1* Coverage of tracer interventions (e.g. child full immunization, antiretroviral therapy, tuberculosis treatment, hypertension treatment, skilled attendant at birth, etc.).</p> <p>3.8.2* Fraction of the population protected against catastrophic/improving out-of-pocket health expenditure.</p> <p>6.1.1 Percentage of population using safely managed drinking water services.</p> <p>6.2.1 Percentage of population using safely managed sanitation services, including a hand-washing facility with soap and water.</p>
<p><b>Utilization</b></p>	<p><b>10 indicators (FAO)</b></p>	<p><b>4 SD targets</b></p>	<p><b>6 indicators</b></p>

# قياس الأمن الغذائي -

## بُعد/محور إستقرار الأمن الغذائي في أهداف التنمية المستدامة (SDGs)

<p><b>Stability</b></p> <p>استقرار الغذاء</p>	<ul style="list-style-type: none"> <li>• Cereal import dependency ratio.</li> <li>• Percent of arable land equipped for irrigation.</li> <li>• Value of food imports over total merchandise exports.</li> <li>• Political stability and absence of violence/terrorism.</li> <li>• Domestic food price volatility.</li> <li>• Per capita food production variability.</li> <li>• Per capita food supply variability.</li> </ul>	<p>1.3 Implement nationally appropriate social protection systems and measures for all, including floors, and by 2030 achieve substantial coverage of the poor and the vulnerable. <b>(economic access)</b>.</p> <p>2.5 By 2020, maintain the genetic diversity of seeds, cultivated plants and farmed and domesticated animals and their related wild species, including through soundly managed and diversified seed and plant banks at the national, regional and international levels, and promote access to and fair and equitable sharing of benefits arising from the utilization of genetic resources and associated traditional knowledge, as internationally agreed. <b>(availability)</b></p> <p>3.c Substantially increase health financing and the recruitment, development, training and retention of the health workforce in developing countries, especially in least developed countries and small island developing States. <b>(utilization)</b></p> <p>5.a Undertake reforms to give women equal rights to economic resources, as well as access to ownership and control over land and other forms of property, financial services, inheritance and natural resources, in accordance with national laws. <b>(availability + economic Access)</b></p> <p>8.2 Achieve higher levels of economic productivity through diversification, technological upgrading and innovation, including through a focus on high-value added and labour-intensive sectors. <b>(economic access)</b></p> <p>8.5 By 2030, achieve full and productive employment and decent work for all women and men, including for young people and persons with disabilities, and equal pay for work of equal value. <b>(economic access)</b></p> <p>8.6 By 2020, substantially reduce the proportion of youth not in employment, education or training. <b>(economic access)</b></p> <p>8.10 Strengthen the capacity of domestic financial institutions to encourage and expand access to banking, insurance and financial services for all. <b>(availability)</b></p> <p>10.2 By 2030, empower and promote the social, economic and political inclusion of all, irrespective of age, sex, disability, race, ethnicity, origin, religion or economic or other status. <b>(economic access)</b></p> <p>12.2 By 2030, achieve the sustainable management and efficient use of natural resources. <b>(all dimensions)</b></p> <p>13.3 Improve education, awareness-raising and human and institutional capacity on climate change mitigation, adaptation, impact reduction and early warning. <b>(availability)</b></p> <p>14.4 By 2020, effectively regulate harvesting and end overfishing, illegal, unreported and unregulated fishing and destructive fishing practices and implement science-based management plans, in order to restore fish stocks in the shortest time feasible, at least to levels that can produce maximum sustainable yield as determined by their biological characteristics. <b>(availability)</b></p> <p>14.6 By 2020, prohibit certain forms of fisheries subsidies which contribute to overcapacity and overfishing, eliminate subsidies that contribute to illegal, unreported and unregulated fishing and refrain from introducing new such subsidies, recognizing that appropriate and effective special and differential treatment for developing and least developed countries should be an integral part of the World Trade Organization fisheries subsidies negotiation. <b>(availability)</b></p> <p>15.6 Promote fair and equitable sharing of the benefits arising from the utilization of genetic resources and promote appropriate access to such resources, as internationally agreed. <b>(availability)</b></p> <p>17.7 Promote the development, transfer, dissemination and diffusion of environmentally sound technologies to developing countries on favourable terms, including on concessional and preferential terms, as mutually agreed. <b>(availability)</b></p>	<p>1.3.1 Percentage of the population covered by social protection floors/systems, disaggregated by sex, and distinguishing children, the unemployed, old-age persons, persons with disabilities, pregnant women/ newborns, work injury victims, the poor and the vulnerable.</p> <p>2.5.1* Ex situ crop collections enrichment index.</p> <p>2.5.2* Percentage of local crops and breeds and their wild relatives, classified as being at risk, not-at-risk or at an unknown level of risk of extinction.</p> <p>3.c.1 Health worker density and distribution.</p> <p>5.a.1 (a) Percentage of people with ownership or secure rights over agricultural land (out of total agricultural population), by sex; and (b) share of women among owners or rights-bearers of agricultural land, by type of tenure.</p> <p>5.a.2 Percentage of countries where the legal framework (including customary law) guarantees women's equal rights to land ownership and/or control.</p> <p>8.2.1 Annual growth rate of real GDP per employed person.</p> <p>8.5.1 Average hourly earnings of female and male employees, by occupation, age group and persons with disabilities.</p> <p>8.5.2 Unemployment rate, by sex, age group and persons with disabilities.</p> <p>8.6.1 Percentage of youth (aged 15-24) not in education, employment or training.</p> <p>8.10.1 Number of commercial bank branches and automated teller machines (ATMs) per 100,000 adults.</p> <p>8.10.2 Percentage of adults (15 years and older) with an account at a bank or other financial institution or with a mobile money service provider.</p> <p>10.2.1 Proportion of people living below 50 per cent of median income, disaggregated by age group, sex and persons with disabilities.</p> <p>12.2.1* Material footprint and material footprint per capita.</p> <p>13.3.1* Number of countries that have integrated mitigation, adaptation, impact reduction and early warning into primary, secondary and tertiary curricula.</p> <p>14.4.1* Proportion of fish stocks within biologically sustainable levels.</p> <p>14.6.1* Dollar value of negative fishery subsidies against 2015 baseline.</p> <p>15.6.1* Number of permits or their equivalents made available to the Access and Benefit-sharing Clearing House established under the Nagoya Protocol on Access and Benefit-sharing and number of standard material transfer agreements, as communicated to the Governing Body of the International Treaty on Plant Genetic Resources for Food and Agriculture.</p> <p>17.7 Promote the development, transfer, dissemination and diffusion of environmentally sound technologies to developing countries on favourable terms, including on concessional and preferential terms, as mutually agreed.</p>
<p><b>Stability</b></p>	<p><b>7 indicators (FAO)</b></p>	<p><b>15 SD target</b></p>	<p><b>19 target</b></p>
<p><b>All</b></p>	<p><b>31 indicators</b></p>	<p><b>36 SD Targets</b></p>	<p><b>51 indicators</b></p>

## متطلبات قياس الأمن الغذائي في المنطقة العربية

- نظام رصد يتعامل مع المفهوم الشامل للأمن الغذائي ويأخذ في الاعتبار جميع أبعاده.
- نظام رصد يأخذ في الاعتبار أهداف التنمية المستدامة ومؤشراتها.
- نظام رصد يأخذ في الاعتبار خصوصيات المنطقة والتفاوت فيما بين الدول العربية (طبيعية/جغرافية ، إجتماعية ، إقتصادية ، .....).
- نظام رصد يأخذ في الاعتبار البعد الإقليمي وشبه الإقليمي والوطني.
- نظام رصد يأخذ في الاعتبار القدرات المؤسسية والامكانيات المادية الإقليمية والوطنية.
- ...

**مهمة صعبة ???**

شكراً لحسن الإصغاء

Economic And Social Commission For Western Asia



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