



Economic and Social Council

Distr.: General

10 October 2022

Original: English

Economic Commission for Africa

Statistical Commission for Africa

Eighth session

Addis Ababa, 24–26 October 2022

Item 3 of the provisional agenda*

Statistics programme of the Economic Commission for Africa: statutory issues

**Follow-up matrix of the recommendations of the seventh
meeting of the Statistical Commission for Africa**

* E/ECA/STATCOM/8/2022/1



<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
Seventh session of the Statistical Commission for Africa (October 2020)			
A. Statistical capacity development in Africa			
The Statistical Commission for Africa:			
1. <i>Approves</i> the creation of an African group on transformation and modernization of official statistics, composed of ten Directors General of national statistical offices, and requests the Economic Commission for Africa to undertake its operationalization	Economic Commission for Africa (ECA)	<p>Two meetings of the group's bureau were organized, on 16 February and 9 March 2021.</p> <p>Three technical teams were created to lead the technical work in the following areas:</p> <ul style="list-style-type: none"> (a) Digitalization and integration of data-science initiatives; (b) Survey methodology; (c) Coordination of the national statistical system and statistical legislation (including administrative data systems and other sources). <p>The draft terms of reference of the technical teams have been prepared.</p> <p>Countries have been providing experts to serve in the technical teams.</p> <p>The website of the group is being developed.</p>	Implementation under way
3. <i>Calls upon</i> pan-African organizations and partners to work in close collaboration and foster synergies to support African countries, in particular those with the lowest levels of statistical development, to mitigate the impact of the ongoing COVID-19 pandemic	ECA, African Development Bank and the African Union Commission	<p>To assist African countries in dealing with the economic impact of the coronavirus disease (COVID-19) pandemic, the African Development Bank put in place a \$10.2 billion crisis response facility to support African countries in addressing the socioeconomic impact of the pandemic. Through the Africa Information Highway initiative, the Bank has supported countries in using the Open Data Platform of the African Information Highway initiative to monitor COVID-19-related developments.</p> <p>The Economic and Statistical Observatory of Sub-Saharan Africa, ECA, the National Institute of Statistics and Economic Studies and the Partnership in Statistics for Development in the 21st Century joined forces to periodically organize a cycle of operational and methodological webinars during the pandemic. Nine</p>	

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
		<p>topics were covered, with an average attendance of 120 participants.</p> <p>To support the resilience of national statistical systems during the pandemic, the Partnership in Statistics for Development in the 21st Century, in collaboration with the African Union Institute for Statistics, ECA and the African Development Bank, has provided capacity-development assistance through online regional training workshops for staff of African national statistics offices and planning ministries/agencies on the third edition of guidelines concerning national strategies for the development of statistics, an advanced data planning tool, and the fourth edition of a capacity development framework.</p> <p>The African Development Bank, ECA, the African Union Commission, the Economic and Statistical Observatory of Sub-Saharan Africa, the Partnership in Statistics for Development in the 21st Century, the Statistics Department of the United Nations, and the World Bank have supported the formulation of national strategies for the development of statistics in the following countries: Congo, Equatorial Guinea, Ethiopia, Gambia, Lesotho, Madagascar, Mozambique, Niger, Senegal, Seychelles, Togo, United Republic of Tanzania and Zimbabwe.</p>	
<p>5. <i>Calls upon</i> Member States to implement the statistical leadership programme within their national statistical systems, and development partners to support the initiatives of countries in the area of leadership training</p>	<p>ECA</p>	<p>The following activities are under way:</p> <ul style="list-style-type: none"> (a) Pilot e-learning course on leadership was organized in March 2021; (b) First meeting of partners was held in March 2021; (c) Online course was organized by the African Centre for Statistics, the African Institute for Economic Development and Planning and the Office for National Statistics of the United Kingdom of Great Britain and Northern Ireland; 	

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
		<p>(d) Workshop on women in statistical leadership organized by the African Centre for Statistics and the Office for National Statistics of the United Kingdom to equip women within the African statistical system;</p> <p>(e) National workshop organized in Egypt by the country's Central Agency for Public Mobilization and Statistics, the African Centre for Statistics, the Economic and Social Commission for Western Asia and the Office for National Statistics of the United Kingdom.</p>	
C. 2020 round of population and housing censuses			
The Statistical Commission for Africa:			
1. <i>Calls upon</i> Member States to renew their commitment to the conduct of population and housing censuses during the 2020 round of such censuses and calls, in particular, for technical assistance and advisory services for countries in conflict and post-conflict countries and also for those that have been affected by the COVID-19 pandemic	ECA	ECA has made available the services of two technical advisers specializing in censuses to assist countries in planning and preparing for their censuses. It organized four webinars to mitigate the impact of COVID-19 on censuses.	
2. <i>Invites</i> the Bureau of the Statistical Commission for Africa to conduct an assessment of the census undertaking, in collaboration with the Economic Commission for Africa, to identify factors contributing to the failure by countries to conduct a census during the 2020 round	ECA and Bureau of the Statistical Commission for Africa	An assessment of the status of the 2020 round of population and housing censuses in Africa has been completed and a report will be presented at the fifty-fifth session of the Conference of African Ministers of Finance, Planning and Economic Development.	
4. <i>Reiterates</i> its call to partners to stimulate national funding of population and housing censuses	ECA and partners	ECA has been engaged with national government and development partners to leverage funds for censuses. Most importantly, ECA has been advocating the digitalization of censuses to increase their efficiency and improve the quality of the data they generate.	
5. <i>Recommends</i> the conduct of a census during the period 2015–2024, given that population and housing census data are indispensable for monitoring progress made in relation to the 2030	ECA	ECA advised all African countries to conduct a census during the period from 2015 to 2024, as population and housing census data are indispensable.	

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
Agenda for Sustainable Development, Agenda 2063 of the African Union, and national development frameworks			
6. <i>Also recommends</i> a transition from manual to digital systems and the use of improved methods and new technologies, which will increase the reliability and accessibility of statistics in a timely manner	ECA	ECA has supported a number of countries by providing them with tablet computers, census monitoring dashboards and a census help desk tool as well as by reconfiguring tablets after data collection and by providing various assessments of preparedness for technical assistants reviewing designs and questionnaires, etc.	
D. Civil registration, vital statistics and the United Nations Legal Identity Agenda			
The Statistical Commission for Africa:			
1. <i>Calls for</i> the establishment of a small committee composed of Registrars General and Directors General of national statistical offices to explore ways to revamp the continental commitment to the Africa Programme on Accelerated Improvement of Civil Registration and Vital Statistics	ECA	An expert group meeting of African registrars general was held in Kigali on building back better to allow a sustainable, resilient recovery of civil registration and vital statistics systems after COVID-19.	
2. <i>Recommends</i> the following key actions for the transformation of the performance of civil registration systems: <ul style="list-style-type: none"> (a) Civil registration systems and the vital statistics that are generated must be strengthened as core components of the response to the COVID-19 pandemic (b) Civil registration systems need to harness the potential of technologies, in particular mobile phones, which are now widely available (c) Member States are encouraged to establish or revamp national population registers that have as their foundations civil registration systems, which would enable governments to derive robust statistical data about their 	ECA	A new strategic plan is being developed for the Africa Programme for the period from 2023 to 2030.	

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
<p>populations on a real-time and continuous basis</p> <p>(d) Member States need to establish automated civil registration, vital statistics and identity management systems that are based on the United Nations Legal Identity Agenda framework</p>			
E. Implementation of the African programme on gender statistics 2017–2021			
The Statistical Commission for Africa:			
1. <i>Endorses</i> a minimum set of gender indicators for Africa	ECA	The minimum set of gender indicators for Africa has been endorsed.	
2. <i>Approves</i> the revision of the second phase of the African programme on gender statistics, in order to align it with COVID-19-related methodological and data requirements	ECA	The second phase of the African programme on gender statistics has been approved.	
3. <i>Calls upon</i> Member States to support the development of gender-related administrative data	ECA	A series of webinars has been held on the development of gender-related administrative data.	
F. 2008 System of National Accounts			
The Statistical Commission for Africa:			
1. <i>Calls for</i> the continuation of existing programmes that are designed to support participation by countries in the implementation of the 2008 System of National Accounts, the System of Environmental-Economic Accounting and related economic statistics	ECA	Actions taken by ECA to support countries' participation in the System of National Accounts include the following: it has led countries in the region to participate in the global update programme for the System; it has run technical assistance and capacity-building projects on the compilation of supply-use tables and the trade-in-value-added framework and indicators; it has supported countries in compiling satellite accounts and city gross domestic product.	

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
		ECA has also continued its support for the Africa Natural Capital Accounting Community of Practice to promote the advancement of the System of Environmental-Economic Accounting and related economic statistics.	
2. <i>Requests</i> that specific initiatives be undertaken to support Member States that are lagging behind in the implementation of the 2008 System of National Accounts	ECA	Given that the 2008 update programme for the System of National Accounts is under way, it is urgent for international institutions to make the necessary consultations and set up a special programme to support countries that are lagging behind in the implementation of the 2008 System of National Accounts before the new update is applied. ECA has continued to provide support through technical assistance.	
3. <i>Recommends</i> regional and international coordination of the support provided to countries and the adaptation of development strategies and cooperation to the new situation due to the pandemic conditions	ECA	ECA has organized several seminars on new methods for collecting price data and has trained two pilot countries on the use of computer-assisted telephone interviewing. A global platform has been established under the governance of the United Nations Committee of Experts on Big Data and Data Science for Official Statistics. A regional hub for Africa has also been established through collaboration between the National Institute of Rwanda and ECA to facilitate the creation of innovative projects, the sharing of methods, algorithms and tools, and the provision of training on big data and data science for the community of official statisticians in Africa. The pilot projects include projects to scrape price data from the Internet.	
G. United Nations Initiative on Global Geospatial Information Management: report on regional activities in Africa			
The Statistical Commission for Africa:			
1. <i>Urges</i> that steps be taken to ensure that the Integrated Geospatial Information Framework is incorporated into national development plans and fully contextualized at the regional level to expand current national data systems to new data frontiers such as earth observation and geospatial big data	ECA	Burkina Faso and Ethiopia have received technical assistance with the development of their country-level action plan on an integrated geospatial information framework.	

Recommendations	Entity responsible	Action taken	Status
2. <i>Requests</i> the Economic Commission for Africa, with assistance from the secretariat of the United Nations Initiative on Global Geospatial Information Management, to develop a comprehensive programme for modernizing geospatial activities in Africa as a vehicle to mobilize resources to enhance the capacity of Member States and as a strategy for a geospatial response to emergency crises, such as the COVID-19 pandemic	ECA	ECA engaged a consultant to prepare a background document on strategic pathways to the modernization of geospatial information in Africa.	Initial findings of the study to be presented for consideration at the eighth meeting of the Statistical Commission for Africa.
H. Standard guiding principles of the Global Statistical Geospatial Framework for the integration of statistical and geospatial information in Africa			
The Statistical Commission for Africa:			
1. <i>Requests</i> the Economic Commission for Africa, with assistance from the Regional Committee for Africa of the United Nations Initiative on Global Geospatial Information Management, to provide policy-level support for the African statistical geospatial framework, and to further prioritize and propose guidelines to advance the implementation of national and regional action plans to integrate statistical and geospatial information in Africa	ECA	Policy guidelines have been developed on geocoding census data in Africa.	Formal editing and translation under way.
2. <i>Recommends</i> that the Economic Commission for Africa continue to support African countries in building and developing their statistical-geospatial information infrastructure in preparation for the 2020 round of censuses and for the achievement of the Sustainable Development Goals	ECA	ECA provided advisory technical assistance to help Cameroon to strengthen the efforts of the Central Bureau for Censuses and Population Studies to manage geospatial data and develop a geocoding scheme for the geospatial analysis of the 2022 population and housing census data. A training workshop was held in June 2022 to build the architecture that will link census cartography data as an integral part of census analysis.	
3. <i>Also recommends</i> that census data dissemination be diversified by using web-based mapping, cloud applications and services and mobile technology to reach a wider audience, with a view to the increased appreciation of census products and of statistical work in general	ECA	Efforts are ongoing to provide advisory technical assistance to Cameroon and Namibia for the development of a geospatial dissemination strategy for the census results using geospatial tools. To improve the quality of census products, a workshop on	Ongoing

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
		improving the use and impact of census results was held in Zambia in April 2022.	
4. <i>Calls for</i> the development of a common regional framework of standards and tools, taking into account their national specific conditions, while aligning the framework with existing internationally agreed standards	ECA	A geocoding manual in being developed that outlines the stepwise guiding principles on geocoding population and housing census data in Africa. The manual will enable national statistical offices to geocode geospatial census data sets following standards and rules that ensure the highest level of data cleaning, normalization, standardization and feature-matching in their geocoding practices.	Under finalization
5. <i>Encourages</i> countries to develop their respective national statistical-geospatial frameworks in accordance with internationally agreed guidelines and principles	ECA	A manual is being developed on standard guiding principles on an African statistical and geospatial framework. The framework comprises five overarching principles for the integration of geospatial and statistical information. It is articulated around the following dimensions: scale; policy; institutional relationship; modelling. National statistical offices and national mapping agencies can adapt the spatial statistical framework to their national context.	
I. Statistical activities in the context of the COVID-19 pandemic: the experiences of Member States			
J. Private-sector experience with big data			
The Statistical Commission for Africa:			
3. <i>Calls upon</i> ECA to constitute a roster of experts to assist Member States in the use of big data	ECA		
K. United Nations global platform and regional hub on big data for official statistics			
The Statistical Commission for Africa:			
1. <i>Calls for</i> the establishment of data science departments/units within national statistical offices in order to develop applications for the use of big data, to integrate this data source in data plans and activities, and to establish a robust partnership among the Economic Commission for Africa, the	ECA		

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
regional hub, and the United Nations global platform being developed by the Global Working Group on Big Data for Official Statistics, to build capacity with a view to making data accessible and to using the technological tools that are already available			
2. <i>Recommends</i> strengthened collaboration with the African Union and the African Development Bank on big data activities and initiatives in the region	ECA		
L. Statistical coordination among United Nations agencies			
The Statistical Commission for Africa:			
2. <i>Requests</i> national statistical offices, in collaboration with the United Nations country teams, to support the proposed United Nations strategy for statistics and, in particular, opportunity and issue-based coalition 1, on strengthened integrated data and statistical systems for sustainable development	ECA	Work was carried out with the United Nations country team in Malawi to find synergies and increase collaboration in United Nations support for the national statistical system.	
M. Open data			
The Statistical Commission for Africa:			
1. <i>Recommends</i> the creation of an African working group on open data, comprising representatives of national statistical offices, with support from the African Development Bank, the African Union Commission and the Economic Commission for Africa, to develop a road map to support Member States in developing legal frameworks, procedural manuals, harmonized frameworks according to international standards, and data portals for the purpose of providing access to their statistical databases	ECA		
2. <i>Requests</i> ECA, in collaboration with the African Development Bank, and the African Union	ECA, the African Development Bank and	The African Development Bank, in collaboration with Open Data Watch, organized in 2021 two webinars to	

Recommendations	Entity responsible	Action taken	Status
Commission, to lead the identification of African open data champions	the African Union Commission	help countries to understand concepts that are key for improving their data openness and improving their classification in the Open Data Inventory ranking system, using the Open Data Platform of the Africa Information Highway initiative. According to the Open Data Inventory report, Burkina Faso made significant progress in its global ranking on data openness by moving from 140th position in 2018 to 86th in 2020.	
N. Data science			
The Statistical Commission for Africa:			
2. <i>Recommends</i> the establishment of an African community of practice for data science, to advocate the development of data science capacity in national statistical offices and to share lessons learned between the United Nations global platform being developed by the Global Working Group on Big Data for Official	ECA		
O. Urban data			
The Statistical Commission for Africa:			
2. <i>Requests</i> the Economic Commission for Africa to continue providing technical assistance to Member States to strengthen their urban data and statistics, guided by the core working group of the African Programme on Urbanization Data and Statistics	ECA	Collaboration took place with the Gender, Poverty and Social Policy Division on the implementation of the African Programme on Urbanization Data and Statistics.	
Q. Statistical capacity-building programmes of partners of the Economic Commission for Africa			
The Statistical Commission for Africa:			
1. <i>Urges</i> the creation of the African Statistical Fund, in line with the implementation of the African Charter on Statistics	African Union Commission		
2. <i>Calls for</i> the establishment of a microdata database on household surveys in Africa and for the improved coordination and advocacy of the Strategy	African Union Commission and ECA	A process of reflection has begun on the establishment of a microdata database on household surveys and censuses.	Ongoing

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
for the Harmonization of Statistics in Africa for the period 2017–2026	and the African Development Bank	<p>Technical assistance in the form of training was provided to Cameroon in February 2022 for it to develop and maintain a microdata database on household surveys and censuses.</p> <p>The African Microdata Library was set up by the African Development Bank with microdata gathered through household surveys.</p>	
3. <i>Welcomes</i> the statistical capacity-building programme of the African Development Bank and calls for strong advocacy for African Development Bank country teams to complement the Bank's statistical capacity-building programme	African Development Bank	African Development Bank country teams are part of the system for ensuring the effective implementation of a statistical capacity-building programme, whose implementation is underway.	
4. <i>Calls upon</i> the African Development Bank to harness technology more effectively and to promote digitalization, so as to enhance the efficiency of its work and its furtherance of the Africa Information Highway initiative	African Development Bank	<ul style="list-style-type: none"> The African Development Bank has already mobilized resources under phase V of the Statistical Capacity-Building Programme for a system upgrade of the African Information Highway initiative to align it with the Statistical Data and Metadata Exchange. The Bank is implementing SDMX capacity-building through the Statistical Data and Metadata Exchange in 18 countries. <p>The Bank also launched its data innovation lab activities under the SCBV.</p> <p>In addition, the Bank is collaborating with the Bill and Melinda Gates Foundation to jointly fund activities and improve implementation of the African Information Highway initiative in 12 African countries.</p>	
5. <i>Calls upon</i> the Partnership in Statistics for Development in the 21st Century to enhance statistical data on development financing, and requests the Partnership to strengthen its assistance to Member States in building the communications skills of statisticians within African national statistical systems	Partnership in Statistics for Development in the 21st Century	<p>The Partnership in Statistics for Development in the 21st Century serves as the secretariat of the Bern Network. In this regard, it developed and launched in 2021 a free platform to serve as a clearinghouse for data on the financing of development, which allows users to analyse data on financing flows, identify funding gaps, and connect to new communities of experts.</p> <p>Information on the financing needs of the following 15 African countries are displayed in the platform:</p>	

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
		Burundi, Côte d'Ivoire, Democratic Republic of the Congo, Ethiopia, Gambia, Ghana, Kenya, Lesotho, Malawi, Madagascar, Mozambique, Niger, Rwanda, Sierra Leone and Zambia. ¹ In terms of communications skills, the Partnership developed and published a handbook for developing a communications strategy that provides strategic guidance and outlines the practical steps and resources needed for national statistical offices to develop an integrated communications strategy. In addition, the Partnership provided training in data communications to statisticians working within several African statistical systems (e.g. Kenya, Rwanda) as well as journalists. Numerous events and webinars were organized where good practices were highlighted and peer learning was promoted. The Partnership has also produced a toolkit on communicating gender statistics. ²	
6. <i>Requests</i> Member States to issue or update existing statistical legal frameworks so that they are in compliance with current statistical developments, with a view to building international trust	ECA	ECA is working with Ethiopia and Seychelles on the revision and modernization of their statistical laws.	
7. <i>Urges</i> Member States to elaborate comprehensive national statistical programmes through national strategies for the development of statistics that are fully aligned with national development plans, so as to ensure domestic funding of statistical activities	ECA	Ethiopia received support in drafting the third national strategy for the development of statistics and the 10-year statistics road map.	
8. <i>Calls upon</i> regional and international partners to support Member States in the transformation and digitalization of their statistical information systems	ECA	ECA is supporting the work of the African group on the transformation and modernization of official statistics.	
10. <i>Invites</i> regional and international partners to support Member States in developing their capacities to provide timely and accurate population and infrastructure data to enhance their governments' response to the COVID-19 pandemic	ECA	A purpose-oriented spatial data taxonomy has been developed and metadata management has been developed for the Sustainable Development Goals. 2. An online data gaps assessment matrix has been developed for the indicators of the Sustainable	1. Completed 2. Ongoing

¹ Available at <https://smartdatafinance.org/>.

² Available at <https://academy.paris21.org/en/course/communicating-gender-statistics>.

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
through geospatial datasets, analyses and tools under an open, non-commercial licence		Development Goals, with practical guidelines on how to assess the contribution of spatial data and products in the monitoring and tracking of the implementation of the Sustainable Development Goals. 3. A crisis-response growth package, a bundle of software, app tools and related training, has been developed to strengthen the technical capacities of targeted countries and support their key workflows for tracking, monitoring and mitigating the impact of COVID-19 (especially for the post-pandemic recovery).	3. Ongoing
Fifty-second session of the Statistical Commission (March 2021)			
Decision 52/101: Global indicator framework for the Sustainable Development Goals and targets of the 2030 Agenda for Sustainable Development			
The Statistical Commission:			
(j) Stressed the need for enhanced technical and financial support for countries to build capacity for monitoring, for the production of Sustainable Development Goal indicators and for the modernization of statistical systems, including on SDMX, geospatial data integration and data innovation, in particular for African countries, the least developed countries, landlocked developing countries and small island developing States	ECA		
(k) Encouraged the Group to explore ways to connect and align its work with the efforts of other international working groups and bodies, including the regional commissions	ECA		
(m) Requested the Group and the custodian agencies to continue their dialogue to enhance the data flow process for global reporting on the Sustainable Development Goals, including by identifying good practices in the implementation of the guidelines on data flows and global data reporting for the Goals and to further refine tools to	ECA		

Recommendations	Entity responsible	Action taken	Status
effectively coordinate data requests to countries, enabling more comprehensive reporting and validation and dissemination of data, and to reduce the national reporting burden, including by making efficient use of existing regional mechanisms or data platforms where possible			
Decision 52/109: Migration statistics			
The Statistical Commission:			
(b) Reiterated the importance of promoting consistency between migration flows and population stocks, of distinguishing international migration from international temporary mobility, and of aligning the definition of migration flows with a country's measurement of the resident population, to ensure consistency in the production of national migration statistics, while striving to promote their comparability at the international level	ECA	ECA participated in the technical meeting on indicators and the operationalization of the conceptual framework of international migration statistics.	
(e) It was emphasized that challenges reside in the implementation of the revised framework and accompanying definitions, including potential issues with international comparability of migration flows, with the measurement of international temporary mobility and stateless and displaced populations, and to some extent in countries relying on administrative registers to produce international migration data	ECA	ECA is co-leading a global programme on migration statistics that will strengthen the systems for collecting, managing, compiling and using migration statistics in a holistic manner.	Follow-up
(f) Therefore, requested the Statistics Division and the Expert Group to be mindful of these challenges in the next steps towards the revision of the 1998 <i>Recommendations</i> , and in particular: (i) To prioritize the work on international migration while clarifying the components of international temporary mobility that will be considered in the revised <i>Recommendations</i> ;	Statistics Division/ECA	ECA, in collaboration with other United Nations entities, has facilitated workshops on migration statistics: <ul style="list-style-type: none"> • Workshop on generating migration data and statistics for better integration in national development plans, in Kampala, in July 2022; • Online course on the International Training Centre of the International Labour 	Follow-up

<i>Recommendations</i>	<i>Entity responsible</i>	<i>Action taken</i>	<i>Status</i>
(ii) To take into account the different migration data ecosystems and related data capacity in countries;		Organization on measuring and analysing labour migration (13 June–22 July 2022).	
(iii) To reflect relevant experience of countries producing international migration statistics based on registered population			
