Data Resources "Available" for Local Economic Assessment in South Africa

Key Words: Local Economic Development, Economic Assessment, Economic Indicators, Economic Structure, Demographics, Economic Data

JEL Classification number: R11, R12

ABSTRACT

This paper looks at the concept of local economic assessment within the context of Local Economic Development (LED) in South Africa. Local government institutions or municipalities are, according to the Constitution of the RSA, responsible for the facilitation and implementation of LED. This assumes that these institutions have the required and necessary capacity, resources and passion to do so. The effectiveness of the LED strategy and therefore the magnitude and reach of the impact of LED is to a significant degree based on the effective and efficient assessment of the local economy. Identifying the relevant data and data resources are, therefore, key to managing an effective and efficient local economy assessment process. This paper identifies the data needed in the local economy assessment process and conceptualizes some of the major potential data resources available.

1. INTRODUCTION

The development strategy of LED has been widely practised in the more developed countries for many decades; however it appears to be a relatively recent phenomenon in South Africa (Nel, 2001). Nel (2001) states that the enhanced status of the local economy and the importance of local decision making have accelerated the trend in the incidence and acceptability of LED in both developed and developing countries, including South Africa. Blakely (1994) defines LED as "the process in which local governments or community-based organizations engage to stimulate local employment

opportunities in sectors that improve the community, using existing human, natural and institutional resources". According to Zaaijer and Sara (1993) LED is essentially a process in which local governments and/or community based groups manage their existing resources and enter into partnership arrangements with the private sector or with each other to create new jobs and stimulate economic activity in an economic area.

The role of local authorities in developing and delivering sound LED strategies, often as part of city development and growth strategies, is crucial and recognized almost unanimously, and therefore the responsibility of LED in South Africa is placed at a local government level. It, therefore, becomes imperative to make sure that local government institutions have the necessary resources, technical ability and willingness to plan, implement, monitor and evaluate the development of the LED strategy for the particular local economy.

One such very significant and crucial resource is economic data, i.e., quantitative and qualitative data relevant to the cause. Zietsman, Ferreira and Van Der Merwe (2006) suggest that in order to ascertain how towns and cities could be supported optimally by a dynamic system of urban strategies it becomes necessary to evaluate and monitor the environment, functions and performance patterns of the towns and cities comprehensively.

Bernard Baumohl in his book "The Secrets of Economic Indicators" (2005) suggests that the most influential economic and business data (indicators) should possess some of the following attributes:

- Accuracy.
- Timeliness of the indicators.
- The business cycle stage.
- Predictive ability.
- Degree of interest.

It must be emphasized that this article is not about LED as such, nor the appropriate objectives or strategies of LED, or the history or progress of LED in South Africa etc, but rather on the data content of the development of an LED plan or strategy, i.e., its foundation. The article will therefore focus on the "analysis" part of the LED process and specifically on the data resources actually and potentially available for the local economic assessment.

2. WHY ANALYZE THE LOCAL ECONOMY?

The rapidly changing economic, social and legal environments, combined with many internal dynamic changes and challenges not previously experienced, have resulted in many urban and rural regions in South Africa facing significant developmental needs. This together with the fundamental recognition and understanding that no two urban or rural regions are the same and that national information is not a perfect substitute for local information,

has cultivated and strengthened the need for a deep understanding of the economy of a particular urban or rural region.

Cortright and Reamer (1998) state that as an economic development practitioner or researcher, your effectiveness is fairly limited unless you can frame what is going on in the economy, and your basic tool for framing is some level of data assessment. Anecdotes and stories from the field, while useful, can take you only so far.

The assessment of the local economy, according to the World Bank (2004), should be the second activity in the process to develop an LED strategy. To develop an LED strategy, the community must be fully informed about their own town or city, their own region and their national economy. Conducting a local economy assessment involves collecting strategically important information and then analyzing it strategically (World Bank, Local Economic Development, 2004).

It thus seems clear that a thorough assessment of the local economy is a non-negotiable in the development of an LED strategy. Importantly however, the assessment must focus on supply of "good" information as identified by Baumohl (2005). Conducting an assessment just for the sake of conducting an assessment is just as fruitless as not conducting an assessment at all. Therefore the focus of the assessment must be on the production of economic data that incorporates most, if not all, of the attributes identified by Baumohl (2005).

From a more theoretical perspective, the availability of economic data allows local economic development and related theories and strategies to be tested empirically. It supports the robust testing of economic models relevant to the local economy and allows for a more technical and strategic approach to the development of an LED strategy. Thus, the availability of economic and related information suggests a more measured and scientific approach to the development of the LED strategy, contributing to the success of the LED strategy.

The use of no or "not good" economic data in developing the LED strategy could only lead to spurious and/or unintended consequences. Such an information vacuum would inevitably lead to the wholesale collapse of the LED strategy causing great damage to the local economy. Incorrect strategy can be much more damaging than no strategy at all, in that the incorrect strategy can negate the strengths of the local economy and exaggerate the weaknesses of the economy. The LED strategy therefore must be based on "good" data to increase its probability of success in terms of creating and supporting economic growth and development within the local economy.

3. IDENTIFYING DATA REQUIREMENTS IN THE LOCAL ECONOMIC ASSESSMENT PROCESS

The Local Economic Development Network of Africa (2009), the World Bank (2004), and Cortright and Reamer (1998) typically measure and monitor the local economy using the following indicators:

- Economic structure: Indicators that focus on the size and sectoral structure of the local economy.
- Socio-Economic Indicators that focus on population, income, employment and numerous other socio-economic and demographic attributes.
- Community Business Profile uses business data to analyse the local mix of businesses.
- Local endowments focus on territorial-specific factors which influence competitiveness.
- Human capital: Indicators that focus on key characteristics of the local population and labour force.
- Quality of life: Indicators that focus on family life and community life.
- Institutions: Indicators that focus on the softer determinants of competitiveness, which relate to the quality and effectiveness of government and informal institutions.
- Demographic information, i.e., information about the people in the community.
- Investment climate information, i.e., information on how the local government treats its business community.
- Hard infrastructure information, i.e., information about the status of water, electricity and wastewater provision.
- Regional and National information, i.e., information on what is happening in other areas that impact on the community.

The Warwick Institute for Employment Research (WIER, 2010) suggests that the local economic assessment meet the following needs:

- An efficient means of generating local economic projections that make maximum use of the national, regional and local information available.
- Easy updating.
- A rigorous and transparent method of assessment, yielding results that can be readily traced back to assumptions.
- An explicit way to introduce local knowledge and views.
- Substantial sectoral detail.
- Substantial labour market detail.
- The ability to implement scenarios and sensitivity testing.
- The ability to carry out impact studies.
- Easy access to results for evaluation, plotting, transfer to other software for report writing, presentations, etc.

4. DATA RESOURCES ACTUALLY AND POTENTIALLY AVAILABLE FOR LOCAL ECONOMIC ASSESSMENT

Once the "what" data to collect has been clearly defined, the "where" to collect the data needs to be considered, i.e., the sources of the identified and required data. The first step here is to determine if the data is available in secondary format or not. If not, then a primary approach will need to be developed to collect the data. If, however, the data indeed already exists then a secondary approach can be used to collect the data.

4.1 Potential Primary Administrative By-product Data Sources

4.1.1 Statistics South Africa

Statistics South Africa (Stats SA) is undoubtedly the data source most frequently used, i.e., the vast majority of Integrated Development Plans (IDP's) and Local Economic Develop Plans (LED's) use Stats SA as the primary data source. It is, in particular, the 1996 and 2001 census data and the 2007 community survey data that are extensively used. Stats SA also publishes information annually about selected building statistics of the private sector, as derived and reported by local government institutions, as well as financial and non-financial census information about municipalities themselves that can be used. They also publish periodical publications, for example the Census of Agriculture Provincial Statistics and Provincial Profile, but as stated they are only periodical or occasional. The vast majority of publications, however, focus on national data only, with a small number of publications, also including provincial data.

From a local macroeconomic assessment perspective, the use of Stats SA as a secondary source of data is positive in so far it is credible, cost effective and readily and easily available. It is also possible to construct a demographic profile of the local economy through the use of the two census and community

survey publications and the changes thereof over the period, i.e., cross sectional assessment. However, it is not possible to construct any of the other indicators as highlighted.

4.1.2 South African Reserve Bank

The South African Reserve Bank (SARB) only focuses on national data and therefore is of very little use, unfortunately. The only real use of the SARB data with regard to the local macroeconomic assessment process would be to situate and discuss the local economy within the context of the current and future state, etc of the national economy, i.e., to contextualize the local economy within the national economy. It would also be possible to derive a range of national economic coefficients from the national data that can potentially be applied to the local economy; for example the consumption and savings coefficients, the wages and capital formation coefficients.

The SARB is very seldom used as a source of information in the local macroeconomic assessment process. It offers very little value in that the data are only relevant to the national economy and cannot be directly related to the local economy. However, it is possible to indirectly use the data as mentioned. The reliability of such indirect use is, however, always questionable and therefore must be used with caution.

4.1.3 South African Revenue Service

The South African Revenue Service (SARS) has at present no mandate with regard to the supply of economic data, i.e., they are not in the business of collecting, processing, interpreting and publishing of economic statistics and other information such as for example, Stats SA and the SARB. Therefore the SARS is, at present, of minimal use in the local macroeconomic assessment process.

SARS is included in the study, not because of the data it can offer now, but because the data it can potentially offer. However, it is very unlikely that these offerings will be become reality given its current mandate, which will have to be extended if it is to become an active source of secondary data. SARS collects a variety of taxes. With the exception of certain income earners and businesses, all income earners and business establishments must pay these taxes. Therefore SARS has a database with almost all income earners and business establishments with their different tax contributions. These data can therefore potentially be highly valuable in the local macroeconomic assessment process.

4.1.4 The Companies and Intellectual Property Registration Office of South Africa (CIPRO)

The Companies and Intellectual Property Registration Office of South Africa (CIPRO) has no data mandate as such, but given its functions, it does have the potential to be a secondary source of data in the local macroeconomic assessment process. It currently supplies data on the total number of active

business entities on a national level as well as data on company liquidations, companies dissolved, close corporations liquidations, etc. The major potential of the CIPRO data is that all their data can be supplied per Standard Industrial Classification (SIC) code and in time series format starting from the year 2000. Unfortunately, the data at present is only supplied on a national and provincial level and not on a local economic level. Therefore the use of CIPRO as a secondary source is at present of minimal use in the local macroeconomic assessment process. Another major limitation is that it ignores sole proprietors and partnerships and therefore excludes a large number of business establishments that operate within a particular local economy. A third major limitation is that their data is not always up-to-date. For it does not indicate when, for example, a close corporation that has operated in a particular local economy has relocated to another local economy. This would not necessarily be reflected in their data.

4.1.5 Local and District Municipalities

Local and district municipalities are mandated to supply a number of services to their respective constituencies; however the supply of data is not such a service. Therefore, at present, municipalities are very seldom used in the local macroeconomic assessment process. Very seldom, if ever, are they being actively used as a source of secondary data. In fact, in most cases they make use of outside sources to generate and supply data pertaining to their local economy. However, there is significant potential within municipalities with regards to data relevant to the local macroeconomic assessment process

through their respective monthly municipal account databases. Municipalities supply accounts on a monthly basis to the majority, if not all, the households and business establishments within their areas of jurisdiction.

Municipalities supply a number of services to households and business establishments; for example water and electricity. They also collect property rates. Thus, they are in possession of a database which contains data on the number and spatial distribution of households and business establishments within their local economy. It therefore would be possible to map via geographic information system (GIS) the number of households and business establishments per predetermined location within the local economy. The municipal account database could therefore be used to construct various household and business establishment indicators, and the changes thereof, because municipal accounts are generated every month for each household and business establishment.

The municipal data are potentially very valuable and useful because they satisfy most, if not all, of the attributes as identified by Baumohl. It also allows the development of a number of indicators otherwise not possible and relevant to the local macroeconomic assessment process. The major limitation with regard to use of the municipal accounts database is that it is very difficult (not impossible however) to extract the required data from the database, and in most cases the ability or willingness to mine and exploit their databases does not exist. In general, their databases suffer from very bad design and the non-adherence to the principles of spatial data models. There

are also some question marks about the reliability of the data, since a number of municipalities are having financial billing and reporting problems.

4.1.6 Bureau of Market Research

The Bureau of Market Research (BMR) itself does not contain a database of data specifically that can be used in the local macroeconomic assessment process. It is, in principle, a consultancy institution founded the University of South Africa (UNISA) in 1960 in Pretoria that conducts research on a commission basis. It is, however, possible to become a BMR member, which allows the member to access data relevant to the local macroeconomic assessment process for that particular local economy, if such data indeed exists. The BMR data can also be used to identify national trends and behaviour that could be applied to the local economy, similar to the use of the SARB.

The major limitations of the BMR with regards to the local macroeconomic assessment process are that the data are, in most cases, at a national level. Also, the data are very specific and therefore are in most cases not relevant, and the data are costly. The BMR is thus very seldom used in formulation IDP's and LED's; however they do have some potential and therefore should not simply be ignored in the local economic assessment process.

4.1.7 Yellow Pages

The Yellow Pages lists business' contact details, divided into business activity categories per region or city. The Yellow Pages, thus, on first glance, seem like a very significant source of secondary information for the local economy. It would be possible to construct a detailed business directory of the local economy on a yearly basis, for example. However, the Yellow Pages, due to confidentially agreements, do not make their data available and not all business entities are listed in the Yellow Pages. It would also be possible to use the normal phone book to construct a household directory of the local economy on a yearly basis, etc., which is very much similar to the business directory. However the phone book suffers from the same shortcomings as the Yellow Pages.

Such a business and household directory would potentially be very useful in that it would give an indication of the spatial dynamics of households and businesses in the local economy, i.e., the number and the change thereof of households and businesses per sub-region, etc.

4.1.8 <u>Brabys</u>

A.C. Braby (Pty) Ltd, according to their website, is the largest and longest established specialist business directory publisher in Southern Africa. It thus seems possible to construct a business directory very similar to the Yellow Pages from the Brabys database. However, there will be issues related to confidentiality, thereby possible eliminating Brabys as a source. Another

major factor will be costs. The Brabys database is privately owned and operated and thus there will be significant costs associated with it.

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4.1.9 Specialised Sources

Specialised sources are institutions, both private and public, that supply specific data that potentially could be used in the local macroeconomic assessment process. These institutions can only supply data relevant to their specific activities and fields of operation, for example:

- National Ports Authority Data relevant to port/harbour operations.
- Private Banks Data relevant to domestic and residential properties and over the counter and ATM transactions.
- National Labour Department Data relevant to Unemployment Benefit Claims.
- Provincial Transport Department Data relevant to number of vehicles per category.
- National Association of Automobile Manufacturers of SA (Naamsa) –
 Data relevant to new vehicle sales.
- Personnel and Placement Agencies Data relevant to the placement of personnel and salaries and wages related to these placements.
- Shopping malls Data on the number of consumers, retail density, total retail expenditure, etc.

The above is only a limited number of sources. The total number of such sources available is potentially very large, depending on the presence of such institutions within the particular local economy. That is, the larger the local economy the bigger the number of potential data sources. It is therefore very important to have a clear understanding of the institutions located within the local economy that can potentially be used as a secondary source. For example, if there is an airport located within the particular local economy then it will be possible to include airport related data, such as number of passenger arrivals/departures, etc.

The issue of sampling becomes very relevant when such data sources are being used. For example, data on the labour market in the local economy is very important and relevant. Businesses, to a large degree, make use of employment, recruitment and/or personnel agencies for the recruitment of staff. However, direct recruitment still takes place, i.e., where businesses recruit staff directly through newspaper advertisements, etc. However, it is much easier to find data on indirect than on direct recruitment. Thus, it becomes very relevant to first determine the relationship between direct and indirect recruitment within the local economy.

It is also possible that there exist a number of employment, recruitment and/or personnel agencies within a local economy. It is often impossible to approach them all because of practical reasons, thus it is important to make use of a sampling methodology to identify the number and details of employment, recruitment and/or personnel agencies to be included in the sample.

Specific sources are potentially very useful sources because the associated data are specific to a particular local economy, and therefore very relevant. The data are also, in most cases, not elsewhere available and therefore such data are unique. These specialised sources, therefore, are potentially very useful and are in some cases being used very extensively.

However, such sources are, in most cases, not recognised sources and therefore there might be some question marks related to the credibility and reliability of the derived data. Also, in some cases, such institutions do not want to make their data available. The usefulness of such specialised sources are, therefore, in most cases, overwhelmed by the effort in gathering the data, and thus these specialised sources are very seldom used, unfortunately.

4.2 Primary Questionnaire Data Sources

Research by Santero and Westerlund (http://econpapers.hhs.se/paper/oedoecdec/170.htm) found that sentiment measures obtained from business surveys provide valuable information for the assessment of the economic situation of an area and can facilitate forecasting. The results of Camba-Kapetanios-Smith-Weale in Pula and Reiff (2002) provide evidence that models based on sentiment variables have a better predictive power in both the United Kingdom and the United States than alternative autoregressive models. However, these papers also demonstrated that sentiment indicators only aid forecasts over a relatively short horizon, i.e., over maximum three months.

McNabb and Taylor (2002) conducted a study with the aim to provide an investigation and a comprehensive empirical assessment into whether confidence indicators can be used to predict business cycle activity across four European economies. The study found that in general consumer and business confidence indicators are leading indicators and pro-cyclical. There is some evidence of causality between the indicators and GDP and confidence indicators would appear to have good predictive power of cycle turning points in relation to other leading indicators.

It therefore seems that conducting a business confidence survey or, on a broader scale, a social economic survey has serious merits and will add significant value to the local macroeconomic assessment process. However, it is imperative that the methodology developed and used be fully recognized and accepted. Otherwise the results of the survey will be spurious at best.

4.3 Secondary Data Sources

4.3.1 Global Insight and Quantec

Global Insight has developed a specific product that can be used in the local economic assessment process. Regional eXplorer (ReX), according to Global Insight, is a consolidated platform of integrated databases that provides accurate and up-to-date economic, socioeconomic, demographic, and development information on a spatial level for South Africa. The product supplies data on the following variables:

- Demographic
- Development
- Labour
- Income and expenditure
- Economic
- International trade
- Environment and weather
- Crime

(Global Insight, Rex Application).

Quantec, according to their website, is a consultancy providing economic and financial data, country intelligence and quantitative analytical software. They have also developed a specific product that can be used in the local economic assessment process. The South African Regional Market Indicators, according to Quantec, provide a unique, disaggregated and consistent view of South Africa's socio-economic structure and market potential on a regional basis down to district and town council level. The product supplies data on the following variables:

- Demographics and income at individual and household level.
- Poverty indicators.
- HIV/AIDS incidence estimates.
- Education & training.
- Labour market indicators such as employment by skill formal and informal, and unemployment.

- Detailed consumer expenditure and retail sales.
- Infrastructure and development.
- Economic indicators such as GDP, labour remuneration and gross operating surplus at the industry level.

(Quantec, website).

A number of municipalities, especially the larger ones, make use of either one of the two secondary data sources because of the "perceived" non-availability of such data from other sources. The data is also presented in a very user-friendly basis and it is available in time series format. The data also adheres to most of the attributes as identified by Baumohl (2005) and can be used to construct most of the indicators as mentioned in heading 3. They are thus significant sources of data relevant to the local economic assessment process.

As good as the data seems to be, there are unfortunately some limitations to them. The major limitation is that the data are very expensive, especially if not being used on a continuous basis. The majority of municipalities seem not to have the financial resources to subscribe to either one of the two sources. A second major limitation is the reliability of the data. The majority of the data contained in the two products is modelled or derived data (data that is generated applying formal data modeling techniques) and not "actual" data and therefore there are question marks over the reliability of the data. There have been some inconsistencies in both of the two products and in some instances some major differences with Stats SA data. A third major limitation

is that there is a general question mark related to the credibility of the data of both products because there seems to be a reluctance to make use of the data in a strategic sense, i.e., model building, empirical testing, etc. In the majority of cases the data are used solely in a descriptive sense.

5. CONCLUSIONS

The local economic assessment process is a crucial activity in the development of an LED strategy. An efficient and effective local economic assessment process can greatly enhance the probability of success of such an LED strategy, but importantly cannot guarantee its success, nor will the absence of such a process guarantee failure. It is nonetheless best practice and recommended that the assessment of the local economy be an integral and crucial part of any LED strategy.

The main objective of the local economic assessment process should be the production of data that satisfy most, if not all, of the stated attributes and can be used to develop and construct the required indicators as suggested. As such it should be mandatory for each LED strategy to be based on an efficient and effective local economic assessment process and the process methodology itself should be discussed in detail in the LED strategy.

The current sources of data, unfortunately, only support the descriptive use of the data in the development and formulation of the IDP's and LED's. Very few IDP's or LED's contain theoretical and/or empirical uses of the data. The local economic assessment process therefore is of very little substance and relevance. For the local economic process to become more significant and relevant so that the process generates data that can be used in more strategic and technical senses, it is imperative that the potential sources become actual sources of data. To this end, it is recommended that a process of consultation be instituted with these potential sources so that they can be utilized in the local economic assessment process.

The use of the current and potential sources together will undoubtedly add value to the local economic assessment process, which will significantly contribute to the effectiveness of the strategy itself. The use of all the data sources together is recommended because they all have limitations and by using them complementarily it is possible to develop most of the required indicators as suggested. The sources must not be seen as substitutes, but as complements to the local economic assessment process.

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