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Sustaining the Right to Water in South Africa

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SUSTAINING THE RIGHT TO WATER IN SOUTH AFRICA

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The political and constitutional framework for South Africa's achievements

South Africa's claim to have turned the "right to water" into a reality has global resonance¹. Its achievements in this field are best understood in the context of its recent political transition. However, the task is not yet complete and current constraints to the achievement of full and sustainable access to water and sanitation services for all reflect political normalisation in the society.

South Africa achieved a negotiated transition from a white minority government to a non-racial democratic order in 1994 in terms of an interim Constitution². A further milestone was the adoption in May 1996 of the final Constitution³ which included two new clauses that significantly strengthened the social content of the Bill of Rights:

24 Everyone has the right –
a) to an environment that is not harmful to their health or well-being; and
b) to have the environment protected for the benefit of present and future generations, through reasonable legislative and other measures that-
i) prevent pollution and environmental degradation;
ii) promote conservation; and
iii) secure ecologically sustainable development and use of natural resources while promoting justifiable economic and social development.

27 (1) Everyone has the right to have access to
... b) sufficient food and water;

These reinforced the core provision of the Bill of Rights that

10. Everyone has inherent dignity and the right to have their dignity respected and protected"

which further underpins the right to water and sanitation since it is difficult to maintain minimum standards of dignity in the absence of water required for health and cleanliness and sanitation facilities which provide a modicum of privacy, convenience and comfort.

However, social rights cannot be absolute and mandatory. The Constitution recognizes that the achievement of social rights is a long term process and provides only that:

27 (2) The state must take reasonable legislative and other measures within its available resources, to achieve the progressive realisation of each of these rights.

This has important implications for water service provision, particularly in the context of the decentralization introduced by the Constitution, which divides government into three autonomous spheres. In terms of this, the objects of local government include

152 (1) b) to ensure the provision of services to communities in a sustainable manner.

and it provides that

156 (1) A municipality has executive authority in respect of and has the right to administer ...

services such as water supply and sanitation. This allocation of authority to the local level, a reflection of the textbook approach to decentralization adopted in South Africa, limits the ability of national Government to intervene in the provision of services and potentially weakens the ability of the State to deliver. So an important provision gives national government a limited but explicit mandate to support local Government in the provision of these services.

“154 (1) The national government and provincial governments by legislation and other measures must support and strengthen the capacity of municipalities to manage their own affairs, to exercise their powers and to perform their functions.”

While in these arrangements, the provision of water *services* (simply put, water in pipes) is a local government duty, responsibility for the management of water *resources* (water in rivers, lakes and underground) is retained by national government and *not* delegated to other spheres of government. This was done after representations⁴ emphasising the importance of managing the country’s river systems, almost all of which cross political boundaries, as integrated units.

The practical implementation mechanisms that have been used;

South Africa’s national programme to provide basic water services to all preceded the adoption of the Constitution although it was driven by the same set of values. Indeed it could be argued that the final Constitution simply reflected and reinforced national policies and priorities that had already been adopted by the new Government.

Surveys before the 1994 elections⁵ found that in rural areas, where more than half the population then lived, water supply was the most important expectation from a new government after jobs. Similarly, in urban areas, the most important expectation after jobs was housing, widely interpreted to include basic water and sanitation services. Estimates in 1991 had indicated that 12 million people, over 30% of the population, did not have access to safe water and 21 million, over 50%, lacked adequate sanitation.⁶

Reflecting this, the ruling ANC party's election manifesto, The Reconstruction and Development Programme (RDP)⁷, included the following commitments :

“2.6.6 The RDP's short-term aim is to provide every person with adequate facilities for health. The RDP will achieve this by establishing a national water and sanitation programme which aims to provide all households with a clean, safe water supply of 20 - 30 litres per capita per day (lcd) within 200 metres, an adequate/safe sanitation facility per site, and a refuse removal system to all urban households.

2.6.7 In the medium term, the RDP aims to provide an on-site supply of 50 - 60 lcd of clean water, improved on-site sanitation, and an appropriate household refuse collection system. Water supply to nearly 100 per cent of rural households should be achieved over the medium term, and adequate sanitation facilities should be provided to at least 75 per cent of rural households. Community/household preferences and environmental sustainability will be taken into account.

2.6.8 The RDP's long-term goal is to provide every South African with accessible water and sanitation.

2.6.9 The RDP is committed to providing operation and maintenance systems which ensure minimum disruptions in service within two years. Particularly in rural areas, the RDP must develop appropriate institutions, including village water committees. Consultation with communities is essential in the provision of water.

2.6.10 Tariffs. To ensure that every person has an adequate water supply, the national tariff structure must include the following:

- 2.6.10.1 a lifeline tariff to ensure that all South Africans are able to afford water services sufficient for health and hygiene requirements;*
- 2.6.10.2 in urban areas, a progressive block tariff to ensure that the long-term costs of supplying large-volume users are met and that there is a cross-subsidy to promote affordability for the poor, and*
- 2.6.10.3 in rural areas, a tariff that covers operating and maintenance costs of services, and recovery of capital costs from users on the basis of a cross-subsidy from urban areas in cases of limited rural affordability.*

Since local government had to be completely restructured, an important element of South Africa's success was the decision that the national Department of Water Affairs and Forestry should initiate a national programme to provide basic services while new municipalities were created.

It took seven years for new local government structures to be formally established. Although decentralization is widely promoted as an important step in achieving effective service provision, it is notable that more than half of the water supply backlog had been

addressed by the national Community Water Supply and Sanitation (CWSS) programme by 2002 when the new municipalities were in place.⁸

The CWSS programme was funded initially from the Department's national budget. As municipalities were established, financial responsibility was transferred to them using the "equitable share of national revenue" and "conditional grant" mechanisms that are provided for local government in terms of the Constitution. As the CWSS programme progressed, the conditions on the use of these funds have been progressively relaxed, giving municipalities greater discretion over how they are used.⁹

Initial policy, reflected in the RDP, was based on international recommendations¹⁰ that all water should be paid for, at least to cover operational and management costs. South Africa's experience was that even small charges – of the order of US\$1 a month - were sufficient to discourage very poor people from using safe water supplies, potentially violating the Constitutional right of access.

The response, which illustrates the process of "progressive realization" of social rights, was to introduce a "free basic water" policy.¹¹ In terms of this, national Government used its regulatory powers to require that all municipalities should endeavour to provide a basic minimum quantity of water (6000 litres per household per month) free of charge to all people in their areas.

(The amount of water provided free was based on the 25 litres per day promised in the RDP, calculated for a family of 8 since only 5.5% of households had more members than this. This is in line with the World Health Organisation's recommendations¹² which suggest that, priority should be to ensure that all people have access to this basic level of service before upgrading to household connections. It also reflects practical experience – where water is provided from communal taps rather than on-site connections, people tend not to use more than 25 litres per person per day.)

This administratively simple approach maintains a balance between social and economic imperatives. Some financial support is provided through "equitable share" transfers which are calculated to take into account the number of poor people in each municipality. "Stepped tariffs" are used in urban areas to provide a cross subsidy from high volume users to low volume users. Service levels such as communal taps serve as "rationing" mechanisms in rural areas. 75% of South African households live in areas where free basic water is provided.¹³

South Africa's progress in closing equity gaps between rich/poor, urban/rural

South Africa remains a highly unequal society and this is reflected in access to water services. The approach taken by government in the first decade of democracy has been to ensure access to minimum "basic" levels of service and to treat higher levels of service as economic or "luxury" services which should be paid for by their users. This applies both to water supply and sanitation.

Levels of access to basic water services are reported annually by the Department of Water Affairs and Forestry. For 2004/5, it reported that

- 44.4 million out of a total of 48.1 million people (92%) were reported to have access to improved water supply infrastructure although 5.4 million of these were below the RDP standard (mainly in terms of distance to source).
- 32.1 million out of a total of 48.1 million people (67%) were reported to have access to some form of improved sanitation facility.¹⁴

Service coverage levels reported by the Department of Water Affairs and Forestry are based on

- census information which includes limited data on access to services;
- information about the investment programmes of different arms of government;
- specialized household surveys.

The provision of a “basic” level of services does not mean that there is equity in service access in the sense that all South Africans receive the same level of service. Households in scattered rural communities are more likely to be either unserved or to receive services below the RDP standard. This has been one reason for maintaining the relatively low “basic service” levels although this has explicitly acknowledged to be but the first step up the “water ladder”.¹⁵

Indeed, one of the challenges of sanitation provision is that poor communities, particularly in smaller urban areas, often refuse to accept on-site sanitation solutions that meet government’s definition of a “basic service” and demand full water-borne sanitation

Although 8.2 million people have been provided with improved sanitation since 1994, the number without access even to basic sanitation remains high at 16 million, almost 33% of the population. The absence of a consensus around an acceptable basic level of sanitation has contributed to the failure to achieve progress similar to that in water supply.¹⁶

At an individual project level, it has however been reported that basic on-site sanitation has been widely accepted suggesting that it may be the delivery approaches used rather than the technologies themselves that are inadequate.¹⁷

Since there is an understandable preference for water borne sanitation in all communities, politicians have little incentive to provide leadership and encourage communities to accept what is clearly a second-best solution. For both political and technical reasons, some larger cities have opted to fund water borne sanitation systems for all their residents, using their own resources.

A further sanitation challenge are the demographic trends with extensive urban migration occurring and average household size shrinking rapidly (from 4.5 to 3.8 between 1996 and 2001, creating an additional two million households).¹⁸ Since the definition of “basic

sanitation” requires individual units for each household, the rapid increase in household numbers has added to the challenge of achieving universal sanitation provision.

Challenges of operational sustainability

Effective access to basic services is a function not just of infrastructure provision but also of its management as well as affordability and convenience to users. It has been demonstrated in many countries that access as measured by actual usage is far less than that reported on the basis of infrastructure provided and some South African critics have suggested that effective access to water supply in South Africa is greatly exaggerated¹⁹.

So with water supply provision, a distinction must be made between

- the provision of infrastructure
- the effective operation of infrastructure to provide reliable supplies;
- the safety of the water provided; and
- whether the people for whom the water is intended actually use it.

Similar considerations apply to sanitation, with actual use a much more critical factor.

Monitoring of South Africa’s CWSS programme was initially done, as in many developing countries, in terms of infrastructure provision and figures were reported in terms of “access to infrastructure”. The expansion of coverage has meant that more attention is now being paid to the sustainability of operations, the safety of water provided and the actual use of the services provided.

An effective way to address these concerns and provide information for policy and management at national level is to conduct household surveys to determine where people actually obtain the water that they use.

In 2003, DWAF collaborated with the Human Sciences Research Council to undertake a specialized national household survey. This found that 91.7% of respondents reported that they “usually used” an acceptable source; the number who reported that they had “actually used” such a source on the previous day was 91.8% (although there were some differences of detail).²⁰ This correlated closely with the official coverage estimates for 2003²¹ and suggests that the reported infrastructure provision does indeed reflect actual access to functioning services.

This work has also enabled widely publicized accusations²² that enforcement of government’s pricing policies were causing poor users to have their services cut-off to be evaluated. The survey included a question “In the past year how often did you experience interruptions of the water service?”

2.6% of respondents reported interruptions “at least once a month” and a further 15% “several times a year”. However, only 7% of all interruptions were reported to be “for non-payment”.

The data on where people “normally” got their water and where they got it “yesterday” supported this. It showed that 0.5% of all respondents “yesterday” got their water from their neighbour rather than from the usual source. However, the largest number who used a different source came from the 11.7% of respondents who normally used free sources close to their homes; on the day of the survey, only 10.9% had used the nearby source while most of the rest had gone to a source more than 200 metres away – suggesting a local supply problem.

The data thus highlighted problems in the management of free public supplies whose users were most likely to have had to resort to alternative sources, often other free services further than the statutory 200 metres away from their homes or to neighbours with alternative sources.

The suggestion that most interruptions were for management related reasons rather than for non-payment would be consistent with operational information about service management. From an operators’ perspective, such interruptions are more often due to technical problems or to “overconsumption” in some areas leading to shortages in others.

However, it is understandable in the context of “normal politics” that political groups campaigning at local level for expanded access to free services should claim that interruptions were punishment for non-payment or part of a larger political agenda. And it is indeed anti-privatisation groups that have led the accusations.²³

Water quality is another important dimension of the management of water services although some commentators believe that an adequate volume of water is more important for health than ensuring that it meets quality standards.

DWAF has reported²⁴ that the majority of municipalities (57% in 2003/4 and 63% in 2004/5) do not follow recommended drinking water quality assurance procedures. As a result, the water they supply cannot be assumed to be safe. More detailed surveys confirmed that, while water quality in the larger urban areas met standards, there were significant problems in some smaller schemes²⁵. It is acknowledged that further work is required in this area before it can be stated with confidence how many South Africans actually use safe water.

Environmental sustainability and service provision.

South African policy distinguishes between the provision of water services (water in pipes) and the management of water resources (water in rivers, lakes and underground)

As in most countries, agriculture is the largest user of water (62%), water services for commercial, social and domestic uses account for 27% of total water use in the country²⁶. Within this, the provision of a basic water supply (25 litres per person per day) to all would require just over 3% of current total water use. In this context, it is clear that the impact of providing basic water supply on environmental sustainability is limited.

However, South Africa is a relatively arid country and available water is unevenly distributed in space and time. Intensity of water use (the proportion of water used compared to that available) is high at over 26%²⁷. In many river catchments, all available water is currently allocated and there is no “new” water available for new users.

Since water is a scarce and valuable natural resource in South Africa, a high priority has been given to developing policies and strategies that ensure the sustainability of the resource. This was undertaken as a completely separate process from the basic water supply and sanitation programme but the political credibility provided by the CWSS programme undoubtedly helped when the Department initiated sweeping reforms to the management of water resources. New legislation (the National Water Act²⁸) was passed in 1998 and the implementation of the policy is now guided by a statutory National Water Resources Strategy approved by Cabinet in 2005²⁹.

The Strategy covers a wide range of activities to reconcile supply and demand and ensure sustainability. Water conservation and demand management is an important element of this and one impact of the “basic water services” approach is that it distinguishes between the “social” element of the service and the “economic” element. In order to promote conservation, water services above the basic level are charged on an increasing block tariff scale.

The National Water Act formally “reserves” a portion of water for environmental purposes, “to sustain the resource”. This is done in terms of a classification system which determines what level of protection is socially desirable and then determines the water requirements to achieve it. This has to be done before any new water allocations can be made. So far, preliminary environmental “reserves” have been determined for about half of the country.

Establishment of the reserve does not mean that it is always achieved in practice since, in many river systems, historic water allocations have exceeded the amount of water available. It does however set a target to be achieved through the new allocation system.

The new arrangement has ended the allocation of water in perpetuity with water “rights” vested in landowners. Water use is now regulated in the national interest and “use rights”, regulated through a licensing system, are limited in time to a maximum of 40 years. This reform reflected formal acknowledgement of the fact that, under water stress, it was important to have a flexible system that would facilitate changes in use over time. A fundamental principle that guided the review of the water law was thus that :-

*The objective of managing the quantity, quality and reliability of the nation's water resources is to achieve optimum social and economic benefit for the nation from their use, recognising that relative allocations may change over time.*³⁰

In addition to the challenge of limited water quantities, South Africa faces serious water quality challenges. These are related to the relative scarcity of water, the intensity of its use and the fact that much of South Africa's economic and social development has occurred high up in river catchments where it affects all downstream users. There is a tension between water service provision and environmental sustainability since the provision of water borne sewerage requires effective disposal of waste water which, if not adequately managed, threatens the quality of the streams into which it is discharged.

There are well documented cases where the failure to manage water-borne sanitation is causing serious pollution of local water resources. However, in the absence of sanitation provision, human waste is simply washed into rivers with storm water. This "diffuse pollution" from poorer areas is also a major problem in some urban areas. The failure to match progress on water supply with similar progress on sanitation provision could thus come to compromise the country's water supply achievements.³¹

These impacts will only be managed by investment in improved urban infrastructure and its effective management. Since many of the communities concerned are too poor to pay the costs of such services, this will depend on government's willingness and ability to promote the provision of effective services and to fund their development.

Both the allocation and quality challenges can be managed but require sustained political support to build and maintain strong institutions able to manage this complex sector.

CONCLUSION

South Africa's national programme to provide basic water services to all was born of the country's transition to democracy and reflected the political priorities of the period, later enshrined as social rights in the Constitution. Innovations such as "free basic water", introduced in recognition of the fact that poor people required subsidies to ensure effective access to safe water, have helped to broaden and sustain their access.

The subsequent decentralization of responsibility for service provision to local municipalities has slowed progress, particularly in poorer communities with weaker municipalities and raised questions about the sustainability of services. The Constitutional rights provide little practical recourse for these communities.

Nevertheless, evidence suggests that the access to basic water supply that has been achieved in South Africa's first decade of democracy is being sustained. The country does, however, face a major challenge to achieve the "additional" Millennium

Development Goal for sanitation, adopted at the World Summit for Sustainable Development with strong support from the South African government. The political challenge of either promoting basic service levels to reluctant communities or providing the massive increase in public resources required to build and operate water borne systems sustainably remains to be addressed.

On a broader front, the progress made in providing basic water services gave water resource managers a strong political mandate to introduce important water resource reforms in the water-stressed country. These were designed to ensure environmental sustainability as well as to allow flexibility in allocations to enable the country to adapt to the demands of a growing economy and population in the face of the challenges of climate change. Failure to make progress on the delivery of sanitation could undermine some of these achievements, particularly in respect of water resource quality.

South Africa's achievements in water supply reflect the opportunities presented by its political transition. In this respect, the current constraints, particularly in the field of sanitation but also in sustaining water supplies reflect the normalization of politics in a complex society.

Table 7: Access to Basic Water Supply Infrastructure (population, millions)

Period	Census Population	Total Improved Supply (not only RDP)	With Access to Basic Services but below RDP service levels	No Access to Infrastructure	% Access to services (Infrastructure)
Current (04/2005)	48.1	44.4	5.4	3.7	92%
People served April '04 - March '05		1.51*	0.6	0.7	
Previous Year (03/2004)	47.4	43.0	6.0	4.4	91%
People served 1994 - March 2005		15.0*	4.4	5.7	
1994	39.8	23.0		15.9	59%

Notes for clarification:

* Total improved supply also includes people served to higher than RDP levels of service
 Figures only reflect infrastructure provided and do not reflect quality of ongoing service provision
 People with access to basic services, but below the RDP service level, was erroneously reported as 5,7m (03/04) instead of 6.0m
 To the 23 million people served in 1994, 15.0 million "new" people were served (as reflected in table) as well as an estimated population growth of 6.4 million "additional people living in already serviced households and areas" (not reflected in table above) to give the total of 44.4 million people, i.e. 23+15+6.4= 44.4

Comments :

- Water Supply backlog figures are Census 2001 based and updated by DWAF using the result of implemented projects across the sector
- Population figures given are based on STATS SA mid year estimates and has been adjusted by 2% to reflect annual population growth
- People served Information provided is based on input from DWAF, Housing, DPLG & estimates from NGO's & Local Government
- Access to basic (RDP) services improved from 59% of population in 1994 to 82% of population in March 2005. In total, 92% of the population now have access to improved services

(Source: Department of Water Affairs and Forestry, Annual Report 2004-2005, Pretoria, 2005)

Table 8: Access to Basic Sanitation Infrastructure (population, millions)

Period	Census Population	Supply, Basic level or higher	No Access to Infrastructure	% Access to services
Current (04/2005)	48.1	32.1	16.0	67%
People served April '04 - March '05		1.3		
Previous Year (03/2004)	47.4	30.3	17.1	64%
People served 1994 - March 2005		8.2		
1994	39.8	19.4	20.4	49%

Notes for clarification:

Figures only reflect infrastructure provided and do not reflect quality of ongoing service provision
 To the 19.4 million people served in 1994, 8.2 million "new" people were served (as reflected in table) as well as an estimated population growth of 4.5 million "additional people living in already serviced households and areas" (not reflected in table above) to give the total of 32.1 million people, i.e. 19.4+8.2+4.5= 32.1

Comments:

- Sanitation supply backlog figures are Census 2001 based and updated by DWAF using the result of implemented projects across the sector
- Population figures given are based on STATS SA mid year estimates and has been adjusted by 2% to reflect annual population growth
- People served Information provided is based on input from DWAF, Housing, DPLG & estimates from NGO's & Local Government
- Access to services improved from 49% of population in 1994 to 67% of population in March 2005

(Source: Department of Water Affairs and Forestry, Annual Report 2004-2005, Pretoria, 2005)

Table 9: Affordable Access to Water (Free Basic Water (FBW))

Period	Total WSA's	Total Population (millions)	WSA's Providing Free Basic Water	Population with access to FBW (millions)	Population with Infrastructure and FBW (%)
Current (04/2005)	170	48.1	162 (95%)	31.9 (66.3%)	75%
Previous Year (03/2004)	170	47.4	161 (95%)	30.5 (65.6%)	73%

Comments:

- Reporting is focussed only on municipalities which are Water Services Authorities (WSAs) that are implementing Free Basic Water, rather than municipalities in total
- Free Basic Sanitation policy has not been established and the associated programme has not been implemented

(Source: Department of Water Affairs and Forestry, Annual Report 2004-2005, Pretoria, 2005)

Table 10: Poor people that benefit from Free Basic Water (FBW)

The following table reflects the status of FBW as at the end of March 2005.

	Population (millions)
Poor people (household income less than R1 000/month) that receive FBW via formal infrastructure and a formal administrative system	17.0
Poor people that receive FBW but no formal administrative system (e.g. standpipes)	4.0
Poor people that receive FBW but at a level below basic supply	2.0
Total number of poor people that share benefits from FBW	23.0
Total number of poor people	29.0

(Source: Department of Water Affairs and Forestry, Annual Report 2004-2005, Pretoria, 2005)

Table 11: Service Quality as reflected by Local Government

The following results are based on a Local Government "self assessment" that reflects their views on Service Quality and Drinking Water Quality Management currently being provided. The figures quoted for both Service Quality and Drinking Water Quality Management reflect a combination of outcomes and not just the adherence to standards alone.

Perspective	Municipalities reporting acceptable service quality	Municipalities reporting acceptable Drinking Water Quality Management Standards
National	34%	37%
Eastern Cape	35%	13%
Free State	31%	95%
Gauteng	53%	58%
KZN	28%	39%
Limpopo	33%	32%
Mpumalanga	41%	23%
North West	26%	29%
Northern Cape	29%	29%
Western Cape	42%	52%

Comments:

- Results are based on feedback from 85% (176) of 207 Local Government Institutions (all WSAs and in some cases Local Municipalities on behalf of District Municipalities)
- This year's assessment of "Service Quality" includes indicators of "existence of a customer service system, levels of staffing, equipment, resources, funding and most importantly the capability to respond within 24hrs to call outs"
- The methodology of analysing the adherence to Drinking Water Quality Requirements has been improved since last year. This indicated that only 37% of Local Government adhered to Drinking Water Quality Requirements as per SABS241 (class 1 - Green). This shows a good correlation with information from other surveys. Applying this to last years' information there has been a 10% improvement in compliance

(Source: Department of Water Affairs and Forestry, Annual Report 2004-2005, Pretoria, 2005)

"Usual source of water" and "Source of water yesterday"

Level of Service	Percent	
	Usual Source of Water	Source yesterday
Piped tap water in dwelling-meter	41.9	42.4
Piped tap water in dwelling-pre-paid	1.6	1.7
Piped tap water on site – meter	10.2	10.1
Piped tap water on site - pre-paid	1.6	1.4
Piped tap water on site - no meter	11.2	11.1
Public tap<200m away-Free	11.7	10.9
Public tap<200m away–Paid	2.9	2.5
Public tap>200m away-Free	5.7	6.4
Public tap>200m away–Paid	1.1	0.9
Neighbour – Free	0.5	0.9
Neighbour – Paid for	0.5	0.6
Water carrier/tanker	0.9	0.7
Borehole on site	0.7	0.7
Borehole off site/communal	1.6	1.7
Rainwater tank on site	0.3	0.3
Flowing river/stream	4.8	5.1
Dam/pool	0.8	0.8
Stagnant pond	0.0	0.1
Well	0.1	0.1
Spring	0.5	0.4
Other, specify	1.3	1.1
Total	100.0	100.0

(usually) **Green (acceptable) = 91.3%**
 (yesterday) **= 91.4%**

Red (unacceptable) = 8.7%
= 8.6%

(Source DWAF, Household survey conducted by Human Sciences Research Council, unpublished, 2004)

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