

UJI DHE NDRYSHIMET KLIMATIKE

Konferenca dhe Ekspozita
e Përbashkët Ballkanike
4-6 Nëntor 2020, Tiranë, Shqipëri



"Programi i Benchmarking - Progresi për shoqëritë UK në Shqipëri dhe Kosovë"

Nadire Vitija
SHUKOS

Tiranë/Zoom, 4-6 Nëntor 2020

HUB Benchmarking Shqipëri dhe Kosovë

Aktiv -2014
Aktual-2020-2019 Të dhënat
 Shqipëri - 5 SHUK,
 Kosovë -7 KRU/all

Shoqeri Ujesjelles
 Kanalizime Shkoder




Shoqeri Ujesjelles
 Kanalizime Tirana

Shoqeri Ujesjelles
 Kanalizime Fier

Shoqeri Ujesjelles
 Kanalizime

Vlore
 Shoqeri Ujesjelles Kanalizime
 Sarande



| LEGJENDA | |
|---|------------------------------|
|  | Grafiku i KRU-ave dhe bashki |
|  | KRU-ja dhe bashkia |
|  | Grafiku i bashki |
|  | KRU-ja dhe bashkia |

Platforma UBP

UBP është e organizuar për të mbështetur SHUK në njohjen dhe përmirësimin e performancës së tyre.



UBP është një mjet i zhvilluar dhe i përdorur si bazë për realizimin e programit për të mbështetur aktivitetet rajonale të krahasimit të SHUK



Koordinimin e aktiviteteve në nivel kombëtar / nën - rajonal dhe rajonal-7 hapat sic vijon; afatin vijtor

Platforma UBP

UBP Platform – Access parameters *Qasja në parametrin e UBP Platformës*



- Email: usually the email of the user
Email: zakonisht email i përdoruesit
- Password: provided by the Hub Coordinator
Paswordi: siguroar nga Koordinatorin i HUB-it

UBP Platform – Language selection *Përzgjedhja e gjuhës në Platformën UBP*



UBP Platform – Your profile *Profili juaj në platformën UBP*



UBP Platform – Your Tasks/Surveys *Defyrat tuaja / Pyetsorët në Platformën UBP*



UBP Platform – Dashboard *Paneli në Platformën UBP*



UBP Platform – Data Entry *Futja e të dhënave në Platformën UBP*



UBP Platform– Data Entry Progress

Zhvillimi i futjës së të dhënave në Platformën UBP

Feqja e Kontrollit të Panelit (shihet poshtë)

DATA ENTRY PROGRESS

1. DATA ENTRY 2. VALIDATION 3. REVIEW 4. APPROVAL 5. FINALIZATION

SEND TO VALIDATION

PROGRESS

UBP Platform – View Indicators

Shiko treguesit në Platformën UBP

SURVEY - INDICATOR REPORT

Treguesit i Logaritmit ndihmon në përcaktimin e nivelit të rrezikut të shprehur në ndryshime të temperaturës. Logaritmi i C dhe i C troqës.

SEND TO VALIDATION

PROGRESS

UBP Platform – View Variables

Shiko variablat në Platformën UBP

SIMPLE VARIABLE REPORT

Variable Name: Temperature, Unit: Celsius, Status: Active, Created By: Admin, Created Date: 2023-01-01

SEND TO VALIDATION

PROGRESS

UBP Platform – Send to Validation

Dërgo për vlerësim në Platformën UBP

SURVEYS DASHBOARD

This survey will be available to users in charge of all grid networks. SEND TO UTILITY VALIDATION

SEND TO VALIDATION

PROGRESS

UBP Platform – Validation in utility *Vlerësimi në SHUK në Platformën UBP*



UBP Platform – Approval in utility *Miratimi në SHUK – UBP Platforma*



UBP Platform – Validation in Hub *Vlerësimi në HUB – Platforma UBP*



UBP Platform – Approval in Hub *Miratimi në HUB – Platforma UBP*



UBP Platform – Publishing

Publikimi në Platformën UBP

Hub representative account

Publishing this survey will make it available in the database. Meaning that the survey will be used to produce benchmarking reports for you and for other companies provided by the Hub members. Your survey will not be anonymously public.

FINISH SURVEY

PUBLISH

I ndihmon ndërmarrjet dhe stafin pjesëmarrës të;

- identifikoj fushat ku përmirësimi i performances nevojitet
- Identifikoj pengesat ku duhet të intervenohet



Objektivat specifikë të platformës UBP

Lejon HUB-et/ të sigurojnë në mënyrë efektive SHUK pjesëmarrëse me shërbime të lidhura me UBP, siç janë;

- mbledhja online e variablave,
- vlerësimi i performancës me llogaritjen e TP,
- krahasimi në nivel kombëtar dhe ndërkombëtar,
- mbështetjen e SHUK pjesëmarrëse në program në:
 - ❖ planifikimin e përmirësimit të performancës, dhe
 - ❖ monitorimi i përmirësimeve të shërbimeve pjesëmarrëse me kalimin e kohës;

Objektivat specifike të platformës UBP

- **Lejon SHUK-të** pjesëmarrëse;
 - të hyjnë, të vendosin të dhënat të llogaritit dhe vërtetojnë të dhënat e performancës së shërbimeve në një ndërfaqetë internetit miqësore për përdoruesit, në baza vjetore, tremujore dhe mujore (duke përfshirë hyrjen e vlerave të synuara të variablave dhe treguesve në të ardhmen, d.m.th. performancën e planifikuar), dhe
 - të prodhojnë raporte dinamike të krahasimit për të krahasuar performancën e vet kundrejt të kaluarës dhe performancës së planifikuar, dhe kundër SHUK-ve të tjera brenda HUB-it që i përket, gjatë gjithë kohës, duke ruajtur të dhënat;

2 Executive Summary

This executive summary shows the company performance on key indicators according to the operational excellence model built in 2012 and updated in 2016. The model is divided in chapters 3 and 4, which enable for the most interesting performance indicators regarding the water and wastewater services. From this we apply to 6 performance areas: Water Quality, Reliability, Service Quality, Sustainable Finance & Efficiency. The Central Information section (chapter 5) shows a number of operational key performance indicators. This Appendix (chapter 6) provides a list of company indicators, a Glossary of terms and further explanations about the indicators of water. It also contains Annex 1 (a DWSG-ROF model provided to data, which covers IT data not used

| Rankings | Country | City | Water production | Revenue |
|-------------------|---------|-----------|------------------|---------|
| City of Barcelona | Spain | Barcelona | 1,113.3 | 1,113.3 |
| City of Valencia | Spain | Valencia | 1,004.0 | 1,004.0 |
| City of Madrid | Spain | Madrid | 1,000.0 | 1,000.0 |

3 Water Section

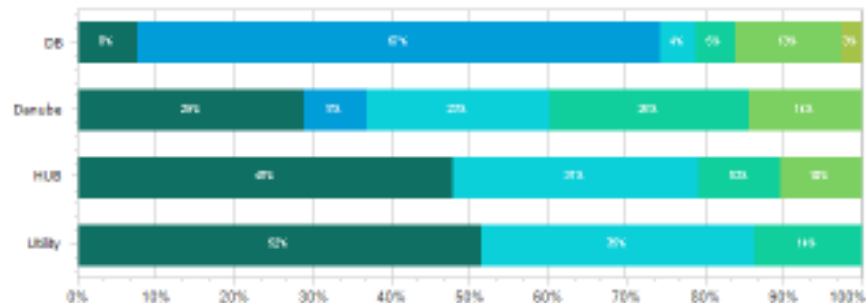
3.1 General information

3.1.1 General information

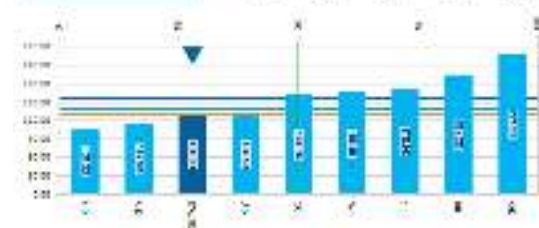
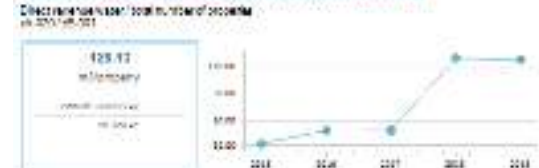


| Relative Indicators | 2016 | 2017 | 2018 | 2019 | 2020 |
|--|------|------|------|------|------|
| Quality (Water quality index) | 100 | 75 | 95 | 65 | 85 |
| Reliability (Water supply reliability) | 75 | 75 | 75 | 75 | 75 |
| Service (Customer satisfaction) | 75 | 75 | 75 | 75 | 75 |
| Sustainable Finance & Efficiency (Cost per unit) | 75 | 75 | 75 | 75 | 75 |

■ A-003.a.1 - Upland surface water sources (m3)
 ■ A-003.a.2 - Lowland surface water sources (m3)
 ■ A-003.a.3 - Natural springs and wellhead sources (m3)
 ■ A-003.a.4 - Well water sources (m3)
 ■ A-003.a.5 - Borehole water sources (m3)
 ■ A-003.a.6 - Saline and brackish water sources (m3)

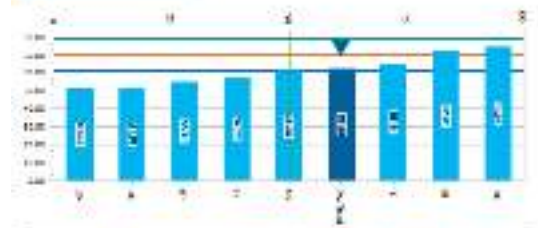
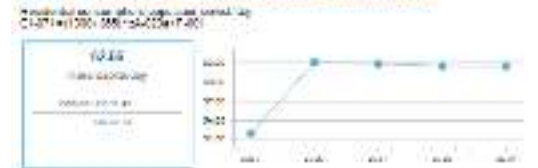


C12-072 - Average consumption per property (m3/property)



| Year | 2016 | 2017 | 2018 | 2019 | 2020 |
|--|------|------|------|------|------|
| Average consumption per property (m3/property) | 100 | 110 | 105 | 120 | 125 |

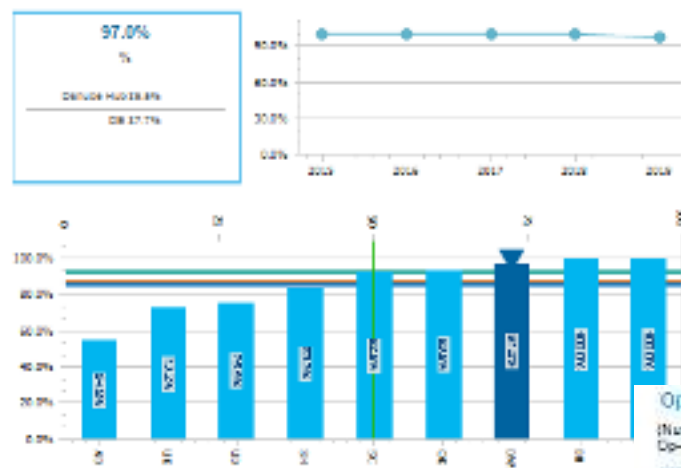
C12-071 - Residents per capita per connection (liters/capita/day)



| Year | 2016 | 2017 | 2018 | 2019 | 2020 |
|---|------|------|------|------|------|
| Residents per capita per connection (liters/capita/day) | 100 | 110 | 105 | 120 | 125 |

QS-003 - Population coverage (%)

Resident population served by the water utility / total resident population * 100
 QS-003 = (I-001 / D-005) * 100



QS-018 - Quality of supplied water (%)

Total number of drinking water tests complying with the applicable standards / total number of tests of drinking water carried out * 100
 QS-018 = (D-002 + D-063 + D-064 + D-065 + D-061) * 100



QS-010 - Quality of supplied water (%)

Total number of drinking water tests complying with the applicable standards or legislation / total number of tests of drinking water carried out * 100
 QS-010 = (D-062 + D-063 + D-064 + D-065) / D-061 * 100



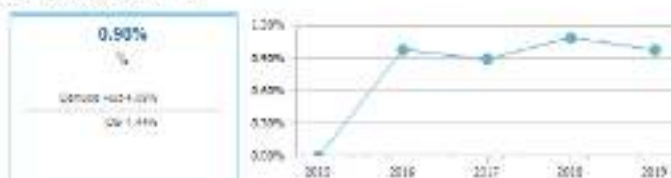
Op-031 - Mains failures (failure/100 km)¹

(Number of mains failures (including failures of valves and fittings) / total mains length)¹
 Op-031 = (D-028 / C-008) * 100



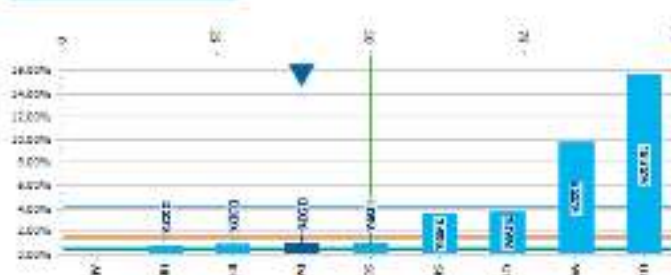
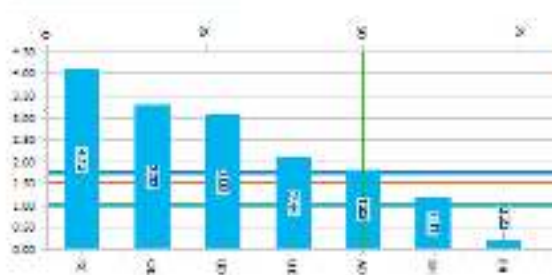
Op-016 - Mains rehabilitation (%)

Percentage of the transmission and distribution mains that is rehabilitated
 Op-016 = (D-020 / C-008) * 100




















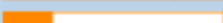


Op-028 - Distribution losses per mains length (m3/km/day)¹

Distribution losses in the year and per km of main length / 365 days, the distribution losses consist of real losses + distribution (including leaking losses), unbilled water and apparent losses.
 Op-028 = (A-010 / C-008) * 365












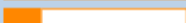








3.3 Performance assessment












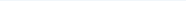

3.3.1 Water Balance

| | | | | |
|--|--------|---|--------|------------|
| [A-023.b.1] Imported raw water | (IN) |  | 0% | |
| [A-023.c.1] Net volume of raw water exchanged with storage | |  | 0% | |
| [A-023.e] Total volume of abstracted raw water | |  | 100% | 91,159,817 |
| [zA-NB-002] Exported and direct revenue raw water | (OUT) |  | 0% | |
| [A-021a] Production losses | (LOSS) |  | 0% | |
| [A-006] Water produced | |  | 100% | 91,159,817 |
| [A-023.c.2] Net volume of treated water exchanged with storage | |  | 0% | |
| [A-023.b.2] Imported drinking water | (IN) |  | 0% | |
| [A-006] Water produced | |  | 100% | 91,159,817 |
| [zA-006] Distribution input | |  | 100% | 91,159,817 |
| [A-007] Exported drinking water | (OUT) |  | 4.38% | 3,994,008 |
| [A-019] Real distribution losses | (LOSS) |  | 10.15% | 9,248,862 |
| [zA-NB-004] Unbilled consumption and apparent losses | (LOSS) |  | 50.04% | 45,679,908 |
| [zA-022] Direct revenue drinking water | |  | 35.43% | 32,275,753 |
| [zA-022a] Residential billed authorized drinking water | |  | 77.88% | 25,134,788 |
| [zA-022b] Non-residential billed authorized drinking water | |  | 22.12% | 7,140,967 |
| [zA-022a1] Residential consumption through direct supplies | |  | 77.88% | 25,134,788 |
| [zA-022a2] Residential consumption through public water points | |  | 0% | |
| [zA-022b1] Volume of water sold to industrial and commercial customers | |  | 15.16% | 4,892,391 |
| [zA-022b2] Volume of water sold to institutions and others | |  | 6.97% | 2,248,576 |

3.3.2 Cost model

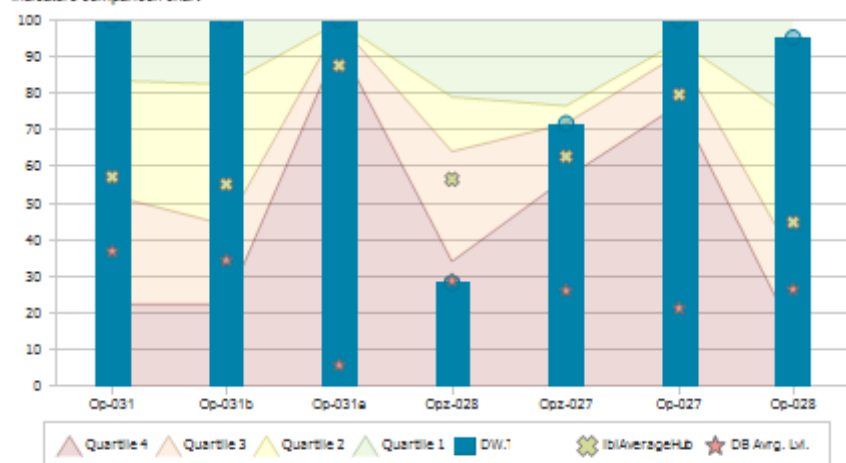
| | | | | |
|--|--|---|--------|--------------|
| [G-002] Total operating revenues | |  | 100% | 29,004,402.6 |
| [G-002b] Operating revenues from non-drinking water activities | |  | 7.92% | 2,297,229.3 |
| [G-002a] Operating revenues from drinking water activities | |  | 92.08% | 26,707,173.3 |
| [zG-NB-002] Savings before taxes | |  | -1.5% | -400,121.6 |
| [G-025] Depreciation costs | |  | 10.13% | 2,704,762.4 |
| [G-021] Net interest | |  | 2.87% | 766,246.9 |
| [zG-NB-003] Operating costs | |  | 88.5% | 23,636,185.5 |
| [G-026] Capitalized costs of self-constructed assets | |  | 0% | |
| [G-028] Running costs | |  | 100% | 23,636,185.5 |
| [G-025] Internal marginal costs | |  | 33.5% | 7,917,248.4 |
| [G-027] Operational costs | |  | 66.5% | 15,718,937.1 |
| [G-029] External services costs | |  | 31.23% | 4,909,147.8 |
| [G-010] Imported raw and drinking water costs | |  | 0% | |
| [G-011] Electrical energy costs | |  | 23.26% | 3,655,484.7 |
| [G-012] Purchased merchandises | |  | 20.72% | 3,266,566.8 |
| [G-013] Leasing and rentals | |  | 3.39% | 532,474.1 |
| [G-014] Taxes, levies and fees | |  | 1.91% | 299,862.6 |
| [G-015] Exceptional earnings and losses | |  | 0% | 167 |
| [G-016] Other operating costs | |  | 19.5% | 3,065,254 |

3.3.3 Revenue model

| | | | | |
|---|--|---|--------|--------------|
| [G-002] Total operating revenues | |  | 100% | 29,004,402.6 |
| [G-002b] Operating revenues from non-drinking water activities | |  | 7.92% | 2,297,229.3 |
| [G-002a] Operating revenues from drinking water activities | |  | 92.08% | 26,707,173.3 |
| [G-025] Capitalized costs of self-constructed assets | |  | 0% | |
| [G-001] Operating revenues | |  | 100% | 26,707,173.3 |
| [zG-NB-007a] National subsidies and grants | |  | 2.94% | 862,108.8 |
| [zG-NB-007b] Foreign subsidies and grants | |  | 0% | |
| [G-002] Sales revenues | |  | 97.06% | 21,835,237.7 |
| [G-027] Water sales revenues from exported water | |  | 0.6% | 131,279 |
| [G-028] Water sales revenues from direct consumption | |  | 99.4% | 21,753,958.7 |
| [G-028a] Water sales revenues from residential consumption | |  | 59.59% | 12,963,397.2 |
| [G-028b1] Industrial and commercial drinking water sales revenues | |  | 28.32% | 6,160,429.8 |
| [G-028b2] Institutions and others drinking water sales revenues | |  | 12.09% | 2,629,831.7 |

3.3.5 Reliability

Indicators comparison chart

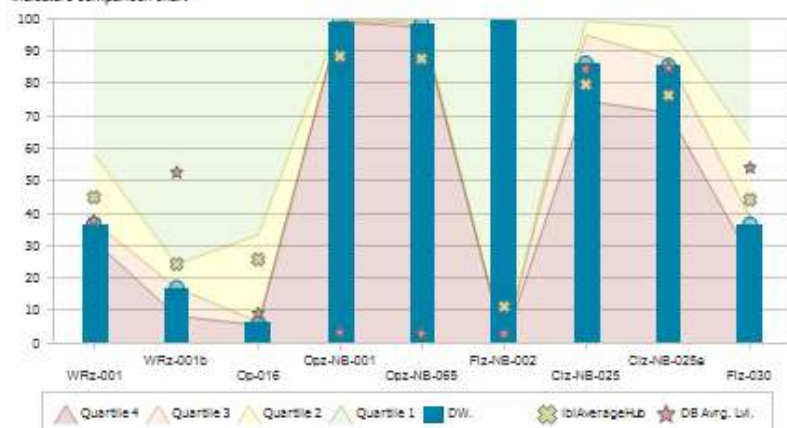


| Selected Indicators | Utility | | Kosovo and Albania Hub | Danube Hub | Delabce |
|--|---------|---------------|------------------------|------------|---------|
| | Value | Yearly change | Average | Average | Average |
| * a lower value implies better performance. | | | | | |
| Op-031 - Mains failures (failure/100 km)* | 0.00 | 0% | 1.76 | 1.02 | 1.52 |
| Op-031b - Mains failures underown responsibility (failure/100 km)* | 0.00 | 0% | 147.59 | 59.14 | 130.66 |
| Op-031a - Mains failures due to third parties (failure/100 km)* | 0.00 | 0% | 26.57 | 42.96 | 21.49 |
| Opz-028 - Distribution losses permains length (m3/km/day)* | 77.56 | -3.38% | 47.47 | 23.18 | 31.14 |
| Opz-027 - Distribution losses perconnection (m3/connection)* | 217.65 | -4.73% | 285.71 | 173.75 | 294.57 |
| Op-027 - Real losses perconnection perday (liter/connection/day)* | 100.54 | -19.15% | 476.94 | 377.06 | 663.89 |
| Op-028 - Real losses permains length (m3/km/day) | 13.06 | -17.99% | 20.88 | 16.14 | 22.27 |

Improvement Unchanged Worsening

3.3.7 Sustainability

Indicators comparison chart

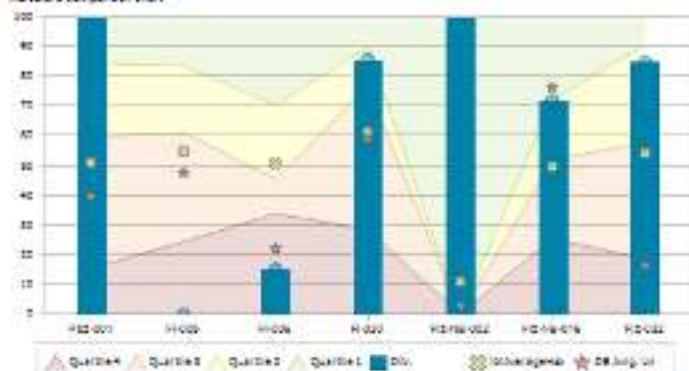


| Selected Indicators | Utility | | Kosovo and Albania Hub | Demube Hub | Delabce |
|--|------------|---------------|------------------------|------------|-----------|
| | Value | Yearly change | Average | Average | Average |
| * a lower value implies better performance. | | | | | |
| WRz-001 - Inefficiency of use of water resources (%)* | 60.21% | -2.83% | 58.11% | 43.12% | 45.70% |
| WRz-001a - Inefficiency of use of water production (%)* | 0.00% | 0% | 5.59% | 8.61% | 8.15% |
| WRz-001b - Distribution losses (%)* | 60.14% | -0.46% | 54.80% | 41.14% | 38.41% |
| Op-053 - Average mains age (years)* | 35.00 | 0% | 31.00 | 29.86 | 35.57 |
| Op-016 - Mains rehabilitation (%) | 0.98% | -10.41% | 4.08% | 0.50% | 1.44% |
| Opz-NB-001 - Electricity use for production and distribution per m3 water produced (kWh/m3)* | 0.34 | 11.12% | 7.13 | 0.46 | 2.00 |
| Opz-NB-065 - Electricity use for production and distribution per m3 water sold (kWh/m3)* | 0.85 | 6.22% | 7.86 | 43.82 | 16.49 |
| Fiz-NB-002 - Equity ratio (%) | 51,626.67% | 10000.91% | 5,763.56% | 4,329.75% | 1,320.50% |
| Fiz-NB-020 - Average water charges for residential consumption per person served (€/person) | 16.13 | 3.77% | 186.40 | 20.83 | 51.42 |
| Diz-NB-025 - Metering level properties (%) | 88.16% | 1.24% | 82.39% | 93.63% | 86.55% |
| Diz-NB-025a - Metering level residential properties (%) | 86.48% | 1.4% | 77.94% | 93.96% | 85.71% |
| Fiz-030 - Total cost by sales coverage ratio (ratio) | 0.81 | -3.37% | 0.86 | 0.84 | 0.87 |

Improvement Unchanged Worsening

3.3.8 Finance and Efficiency

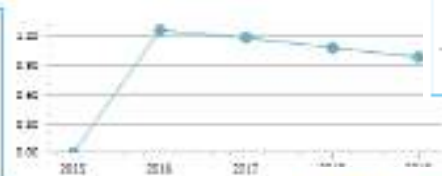
Indicators comparison chart



| Selected indicators | units | Current and comparison | | |
|--|-------|------------------------|-------------|----------|
| | | Value | Year change | Average |
| FI-001 - Average water leakage to total consumption (litre) | | 0.07 | -2.10% | 7.52 |
| FI-002 - Average water leakage to recycled water (litre) | | 0.03 | -50.74% | 0.09 |
| CO-001 - Average water leakage to property (litre) | | 98.36 | 0.98% | 1,291.95 |
| FI-003 - Revenue / sales by (M€) / (M3) | | 0.90 | 2.98% | 0.91 |
| FI-004 - Unit running costs (€litre) | | 0.66 | 2.77% | 0.44 |
| FI-005 - Unit capital costs (€litre) | | 0.10 | 1% | 0.12 |
| FI-007 - Ratio of energy maintenance in running costs (%) | | 35.8% | 2.05% | 58.8% |
| FI-008 - Ratio of electric services cost in running costs (%) | | 20.8% | 12.40% | 4.2% |
| FI-009 - Ratio of impeded (or non-optimised) water costs to running costs (%) | | 0.00% | 0% | 2.90% |
| FI-010 - Ratio of electric energy cost in running costs (%) | | 16.47% | -0.77% | 19.15% |
| FI-011 - Ratio of electric energy cost in capital costs (%) | | 77.02% | 0.75% | 117.62% |
| FI-012 - Investment to asset ratio (percentage) | | 0.00% | 0% | 132.38% |
| FI-013 - Total cost coverage ratio (ratio) | | 0.00 | -3.24% | 0.96 |

FI-010 - Total cost coverage ratio (ratio)

Total revenue / Total cost
 $FI-010 = G-001 / G-004$

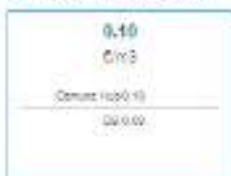


FI-NB-015 - Collective rate (%)



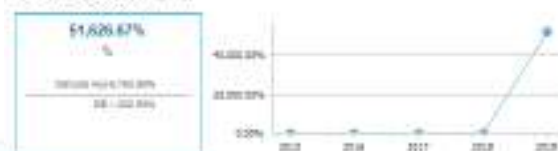
FI-006 - Unit capital costs (€litre)

Capital costs / revenue water (including exported water)
 $FI-006 = G-006 / (G-A-020 + A-007)$



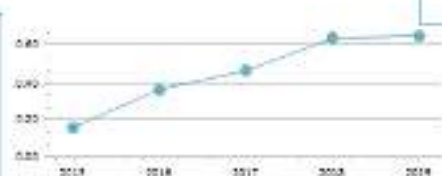
FI-NB-002 - Equity ratio (%)

Total equity / total assets
 $FI-NB-002 = G-049 / G-090 * 100$



FI-005 - Unit running costs (€litre)

Running costs revenue water (including exported water)
 $FI-005 = G-005 / (G-A-020 + A-007)$



FI-011 - Investment to asset ratio (%)

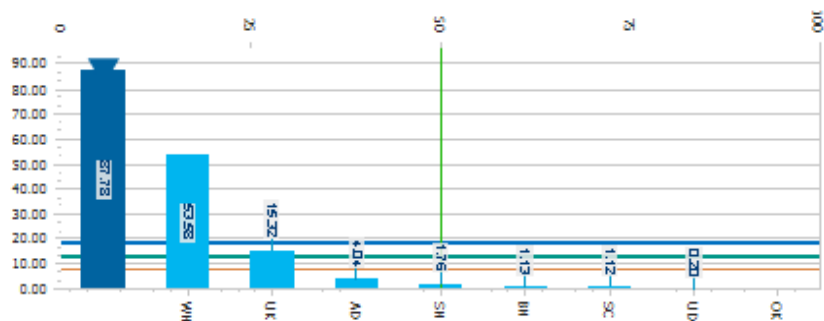
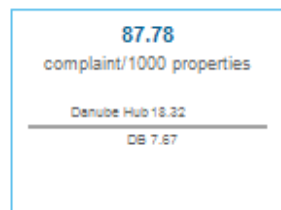
Investment to asset ratio (percentage)
 $FI-011 = G-012 / G-013 * 100$



Q Sz-027 - Service complaints per connected property (complaint/1000 properties) *

(Total service complaints / Total connected properties) * 1000

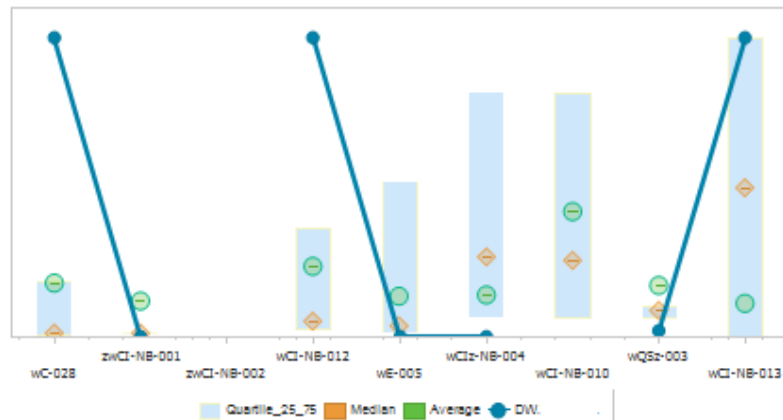
Q Sz-027 = (F-015 / zE-001) * 1000



4 Wastewater Section

4.1 General information

Indicators comparison chart



| Selected Indicators | Utility | | Keovo and Alibona Hub | Denube Hub | Debače |
|--|------------|---------------|-----------------------|------------|------------|
| | Value | Yearly change | Average | Average | Average |
| * a lower value implies better performance. | | | | | |
| wC-028 - Connected properties (No.) | 237,802.00 | 1.56% | 62,946.44 | 61,166.00 | 122,157.71 |
| zWCI-NB-001 - Collected sewage per property (m3/property) | 0.00 | 0% | 1,448.64 | 133.64 | 418.63 |
| zWCI-NB-002 - Stormwater volume to WWTP (m3/property)* | 0 | 0% | 0 | 50 | 47 |
| wCI-NB-012 - Property density (property/km) | 394.36 | 1.39% | 172.92 | 156.22 | 213.81 |
| wE-005 - Population equivalents served by WWTP (PE) | 0 | 0% | 13,271 | 54,997 | 315,276 |
| wCIz-NB-004 - Treated wastewater per property (m3/property) | 0.00 | 0% | 8.29 | 93.14 | 124.85 |
| wCI-NB-010 - Average design capacity WWTPs (PE) | | | | | |
| wQBS-003 - Household size (inhabitant/property) | 1.00 | 0% | 8.91 | 2.69 | 3.84 |
| wCI-NB-013 - Properties per service connection (properties/connection) | 1.17 | 17.39% | 1.02 | 1.96 | 4.61 |

Improvement Unchanged Worsening

Ku ishim

- Jo mjet bazuar në standarde për të bërë B të brendshëm
- Jo ekip të caktuar që punon për të përmirësuar performancën
- Jo raport permbledhës i brendshëm i kompanisë me IKP
- Mungese e regjistrit të t
- Jo krahasim të bazuar në
- Jo Vetë-Vlerësim për Përmirësim të Performancës
- Jo raport i brendshëm për vendimmarrësit (të brendshëm ose të jashtëm)

The image shows a screenshot of a performance dashboard. At the top, there are logos for 'BERALUB' and 'ALUB'. Below the logos is a table with several columns and rows. The table has a yellow highlight on the bottom row. Below the table, there is a small text box with some illegible text.

Progresi i SHUK në HUB Shqipëri dhe Kosovë

Ku jemi

- U krijua një mjetë efikas për UB
- U themeluan Ekipë UB që synojn të përmirësojë performancën me kalimin e kohës
- Raporte Individuale të SHUK me TKP
ja e numrit dhe cilësisë së të nave
nasimi (me vetveten-kolege-HUB)
uar në SN
- Vetë-Vlerësim për Përmirësim të Performancës
ë-Vlerësim për Përmirësim të
ormancëspërmes hulumtimeve
sistematike
- Raport i brendshëm-Përdorim nga vendimmarrësit (të brendshëm ose të jashtëm)

BENCHMARKING-KRAHASIM I BAZUAR NE STANDARDE

BENCHMARKING -Shërbimet tona e kuptojnë dhe e përdorin për të përfituar nga vetja, për të identifikuar boshllëqet dhe mundësitë për të përmirësuar performancën.

BENCHMARKING-Praktikë e krahasimit në Ujësjiellësa, duke garantuar një komunikim dhe informacion më të rrjedhshëm dhe efikas midis departamenteve.

BENCHMARKING është mekanizëm i fuqishëm që ujësjiellësit të jenë;

EFEKTIV-DOING THE RIGHT THINGS
EFFICIENT- DOING THE THINGS RIGHT

Ju faleminderit



SHUKOS, Shoqata e Ujësjiellësve dhe Kanalizimit të Kosovës



SHUKOS



SHUKALB, Shoqata Ujësjiellës Kanalizime e Shqipërisë



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