



QUARTERLY REPORT BOTTLED WATER QUALITY

(July-September, 2016)



PAKISTAN COUNCIL OF RESEARCH IN WATER RESOURCES

Ministry of Science & Technology

Khyban-e-johar, H-8/1, Islamabad.

www.pcrwr.gov.pk

July-September, 2016



SUMMARY

The poor quality of drinking water has forced a large cross-section of citizens to buy bottled water. However, many of the mineral water companies were found selling contaminated water. To monitor and improve the quality of bottled water, the government of Pakistan through Ministry of Science and Technology has designated the task for quarterly monitoring of bottled/mineral water brands to PCRWR. According to the monitoring report for the quarter July-September, 2016 following is the brief overview of the findings.

Quarterly Monitoring of Bottled/Mineral Water (July-September, 2016)

| | | |
|---|---|--|
| No. of Brands Collected | 109 | |
| No. of Cities Targeted | Islamabad, Rawalpindi, Gilgit, Muzaffarabad, Faisalabad, Sialkot, Sargodha, Multan, Lahore, Bahawalpur, Karachi, Tando Jam and Peshawar | |
| No. of Overall Safe Brands | 98 | |
| Overall Unsafe Brands (11) | Brand Name | Manufacturer(s) |
| | Premier Fresh | Zafir Industries:19-Km Near Highnoon Laboratories Multan Road Lahore |
| | Well Care | Manufactured by: Well care International (Pvt.) Ltd Khanewal Road Multan wellcare1222@gmail.com |
| | National | Nazir Enterprises: Dera Bakha Bahawalpur nazirenterprises500@gmail.com |
| | Siiz Cool | A Product Of Siiz Cool Marketing:1-Bandesha Street Near Madina Hospital Sabzazar Colony Bosan Road Multan Siizmarketing941@gmail.com |
| | Blue Plus | Q.N Traders Site Karachi |
| | New ARBO | Bottled By: Al-Haram enterprises 410/15B, Buffer Zone Karachi |
| | Cottage Foods Drink Water | Cottage Foods:31-E,Sector 23 Korangi Industrial Area Karachi |
| | Reliable | 0311-2294661 (Address is not given) |
| | Pacific Pure | Pacific Water Engineer G.T Road Lahore |
| | OAS Water | 93-Tariq Block, Garden Town Lahore |
| Aqua National | Bottled by: MILLI Brothers, 8-Km, G.T Road, Shadara Lahore | |
| Chemically Safe Brands | 98 | |
| Chemically Unsafe Brands | 11 | |
| No. of Microbiologically Safe Brands | 109 | |
| Microbiologically Unsafe Brands | 0 | |



INTRODUCTION

Drinking water quality is deteriorating continually due to biological contamination from human waste, chemical pollutants from industries and agricultural inputs. Piped water also gets contaminated because pipes are laid very close to sewerage lines or open drains and cause many serious water borne diseases. It was found that 45% of infant deaths have been attributed to diarrhea and about 60% to overall infectious waterborne diseases in Pakistan. According to the World Health Organization (WHO) 25-30% of the diseases are gastro-intestinal in nature. The poor quality of drinking water has forced a large cross-section of citizens to buy bottled water. As a consequence of this expanding market a mushroom growth of bottled water industry in the country is witnessed during the last few years. However, many of the mineral water companies were found selling contaminated water. To monitor and improve the quality of bottled water, the government of Pakistan has designated the PCRWR as focal point agency.

1. Ministry of Science & Technology informed PCRWR Vide U.O. No. 5(21)/2004-ATA-II dated 17.10.2005 that the Cabinet in its meeting under the chairmanship of Prime Minister directed Ministry of Science & Technology to undertake regular survey/samples of bottled/mineral water at source of production publicize the results on a quarterly basis and follow up with punitive/legal action.
2. Ministry of Science & Technology has assigned the task of quality monitoring of bottled water and publicize the results to PCRWR Vide U.O. No.1(1)/2005-Secy (MoST) dated 8.12.2005.

PCRWR SAMPLING METHODOLOGY

| | | |
|------------------------------|---|---|
| No. of Brands Collected | 109 | |
| No. of Cities Targeted | (Islamabad, Rawalpindi, Gilgit, Faisalabad, Sialkot, Sargodha, Multan, Lahore, Bahawalpur, Karachi, Tando Jam, and Peshawar). | |
| Composition of Sampling Team | One Research Officer and Two Laboratory Assistants | |
| Sampling Procedure | Samples of One hundred and nine commercially available brands of mineral/bottled water were collected from local market of thirteen cities of Pakistan. These samples were collected by the senior staff members of National Water Quality Laboratory (NWQL) of PCRWR Head Office and Regional/district Water Quality Laboratories of PCRWR during July-September, 2016. A set of four bottles of each brand was collected and sealed on site. Identification codes were allotted to all the brands according to PCRWR Bottled Water Classification System. | |
| Transparency | Sample No. 1 | Handed over to shopkeeper at the time of sample collection; |
| | Sample No. 2 | Preserved in the National Water Quality Laboratory of PCRWR, Islamabad for future record. |
| | Sample No. 3 | Used for Microbiological Analysis |
| | Sample No. 4 | Used for Physico-chemical Analysis |



PCRWR BOTTLED WATER CLASSIFICATION SYSTEM

| Brand Name | PCRWR Code | City | Date of Collection | Date of Expiry | Size | Name & Address of Seller/Shop Keeper | Manufacturer's Address |
|-------------|------------|--------------|--------------------|----------------|-----------|---|---|
| Fresh Life | BWK-01 | Islamabad | 28/7/2016 | 07/2017 | 0.5 Liter | T&S Enterprises office No.1 main hall road Pindori Road main khana Dak Islamabad Freshlife786@gmail.com | T&S Enterprises office No.1 main hall road Pindori Road main khana Dak Islamabad Freshlife786@gmail.com |
| MEHR | BWK-02 | Islamabad | 28/7/2016 | 12/2017 | 0.5 Liter | Bottled By: Pir MEHR Ali Shah Arid Agriculture University Rawalpindi | Bottled By: Pir MEHR Ali Shah Arid Agriculture University Rawalpindi |
| Atlantic | BWK-03 | Islamabad | 28/7/2016 | 07/2017 | 1.5 Liter | Ayza Society Near Yamaha Factory Sihala industrial Area Islamabad | Ayza society Near Yamaha Factory Sihala industrial Area Islamabad |
| Hydr8 | BWK-04 | Islamabad | 29/7/2016 | 06/2017 | 0.5 Liter | T-7,Sardar Arcade 2,G-11 Markaz Islamabad | T-7,Sardar Arcade 2,G-11 Markaz Islamabad |
| White Gold | BWK-05 | Islamabad | 29/7/2016 | - | 0.5 Liter | Global Enterprises: Office 9, 2 nd floor Lord Trade Centre F-11 Markaz Islamabad | Global Enterprises: Office 9, 2 nd floor Lord Trade Centre F-11 Markaz Islamabad |
| Maple Dew | BWK-06 | Islamabad | 20/09/2016 | 05/2017 | 0.6 Liter | Maple Dew Purification Plant Sohan Islamabad | Maple Dew Purification Plant Sohan Islamabad |
| Deep Spring | BWK-07 | Islamabad | 20/09/2016 | - | 0.6 Liter | A Product of BNK(Pvt)Ltd Plot No.226,St#7, Sector I-9/2, Islamabad | A Product of BNK(Pvt)Ltd Plot No.226,St#7, Sector I-9/2, Islamabad |
| Verbena | BWK-08 | Islamabad | 20/09/2016 | 06/2017 | 0.5 Liter | Vizor Pharma Pvt(Ltd)82-Lalazar State Rawalpindi | Vizor Pharma Pvt(Ltd)82-Lalazar State Rawalpindi |
| Hydra | BWK-09 | Islamabad | 20/09/2016 | 09/2017 | 0.6 Liter | Bottled By: Pakistan PVC Limited(Food Division)31-A, Sector I-9, Islamabad | Bottled By: Pakistan PVC Limited(Food Division)31-A, Sector I-9, Islamabad |
| YAS | BWK-10 | Muzaffarabad | 4/08/2016 | - | 0.6 Liter | Mohsin Naqvi, YAS Pure Water, Near Neelum Flour Mill, Muzaffarabad | Kashmir Natural Resources(Pvt)Ltd Muzaffarabad yas@neelum.pk |
| Al Shalal | BWK-11 | Sialkot | 20/07/2016 | 06/2017 | 0.6 Liter | Abdul Hameed Pan Shop Shahab Pura Road Near Warid Office Sialkot | Bottled and Sourced at AZO Enterprises Seokay 14-km Sialkot Aminabad Raod Sialkot |
| Al-Haider | BWK-12 | Sialkot | 20/07/2016 | 03/2017 | 0.5 Liter | Saeed Pan Shop China Chowk Sialkot | Gulshan Iqbal Park China Chowk Sialkot |

PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



| Brand Name | PCRWR Code | City | Date of Collection | Date of Expiry | Size | Name & Address of Seller/Shop Keeper | Manufacturer's Address |
|-------------|------------|------------|--------------------|----------------|-----------|--|---|
| OASIS Plus | BWK-13 | Sialkot | 20/07/2016 | - | 0.6 Liter | Mehr Amjad PanShop Shahab Pura Road Sialkot | www.oasisplus.com.pk |
| ECO | BWK-14 | Sialkot | 21/07/2016 | 06/2017 | 0.6 Liter | Product of J&J Foods and Beverages Roras Road Naul Chowk Sialkot Pakistan | Product of J&J Foods and Beverages Roras Road Naul Chowk Sialkot Pakistan |
| JERS | BWK-15 | Sialkot | 20/07/2016 | 06/2017 | 0.6 Liter | Lucky pan Shop Defance Road Sialkot | Manufactured by: Jers Traders. Opp. Bismillah CNG Gujranwala Road, Daska |
| Isberg | BWK-16 | Sialkot | 21/07/2016 | - | 0.6 Liter | Premier Water Purifying Company, Dhobola Roras Road, Sialkot | Premier Water Purifying Company, Dhobola Roras Road, Sialkot |
| Bake Master | BWK-17 | Sialkot | 20/07/2016 | 06/2017 | 0.6 Liter | Bake Master Bakery Shahab Pura Road Sialkot | 0342-6661666 0333-8656666 |
| Athar | BWK-18 | Sialkot | 21/07/2016 | 07/2017 | 0.5 Liter | Manufactured By Ajva rice Mill Pakistan Haji Pura Road Sialkot E-mail: Ajva Rice@gmail.com . | Manufactured By Ajva rice Mill Pakistan Haji Pura Road Sialkot E-mail: Ajva Rice@gmail.com . |
| AQUA SAVE | BWK-19 | Sialkot | 20/07/2016 | 06/2017 | 0.6 Liter | Khalifa Pan Shop Shahab Pura Road Sialkot | Bottled By:SFS Mineral Water Company Wazirabad Road Jalianwala Ugoki Sialkot |
| Rise Water | BWK-20 | Sialkot | 21/07/2016 | 06/2017 | 0.6 Liter | Pure Foods Sialkot 3-km Kingra Road Sialkot | Pure Foods Sialkot 3-km Kingra Road Sialkot |
| ICE Well | BWK-21 | Sialkot | 20/07/2016 | 07/2017 | 0.6 Liter | Yaseen PanShop Near Haji Pura Road Sialkot | Bottled by: Quaint Beverages Industries Baghwal Awan P.o. Khas Sialkot E-mail quaint.beverages@att.net |
| VINA | BWK-22 | Sialkot | 21/07/2016 | 07/2017 | 1.5 Liter | Al-Sultan Beverages industries: Chaprar Road Gul Bahar Kalan Sialkot | Al-Sultan Beverages industries: Chaprar Road Gul Bahar Kalan Sialkot |
| Coral Water | BWK-23 | Sialkot | 21/07/2016 | 05/2017 | 1.5 Liter | Bottled By: Combine Brothers Traders Adda Khrana Sialkot www.coralwater.com.pk 0333-8606644 | Bottled By: Combine Brothers Traders Adda Khrana Sialkot www.coralwater.com.pk 0333-8606644 |
| Roha Water | BWK-24 | Faisalabad | 25/07/2016 | 06/2017 | 0.6 Liter | Baba Ji Pan Shop Makuana Chowk Bypass Faisalabad | Manufactured By:Beere Roha International(Pvt)Ltd. Murree Road Near P.M.A Abbottabad E-Mail pelicansco@gmail.com |

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| Brand Name | PCRWR Code | City | Date of Collection | Date of Expiry | Size | Name & Address of Seller/Shop Keeper | Manufacturer's Address |
|-------------------|------------|------------|--------------------|----------------|-----------|---|---|
| Super Natural | BWK-25 | Faisalabad | 25/07/2016 | 05/2016 | 0.6 Liter | Madeer Karyana Store Kashmir Road Faisalabad | Well-o-(Pvt)Ltd .P-958,st#12 Muhammad Abad Faisalabad |
| Pure Pani | BWK-26 | Faisalabad | 25/07/2016 | 05/2017 | 0.6 Liter | Subhan Travel Agency GTS Chowk Faisalabad | A product of Attari's Brother. Purepani@green.com.pk |
| Aquwa Plus | BWK-27 | Faisalabad | 25/07/2016 | 06/2017 | 0.6 Liter | Shafqat Pan Shop Jhumra Road Faisalabad | A.R Traders Gojra Pakistan Email:- aquwaplus@yahoo.com . |
| Blu Water | BWK-28 | Faisalabad | 25/07/2016 | 05/2017 | 0.6 Liter | Kohistan Bus Stand GTS Chowk Faisalabad | Al-Hilal industries (Pvt) Ltd Sultan Nagar Vehari Road Multan Pakistan |
| Rachna | BWK-29 | Faisalabad | 25/07/2016 | 06/2017 | 0.6 Liter | Boss Pan Shop Lari Adda Faisalabad | Site Office: Ghazi Town Jaranwala rachnapurewater@gmail.com |
| Aab-e-Kausar | BWK-30 | Faisalabad | 25/07/2016 | 04/2017 | 1.5 Liter | Lucky Naz Pan Shop Near Meezan Bank Jhumra Road Faisalabad | A Product of Fazal Sons |
| Infinity | BWK-31 | Sargodha | 25/07/2016 | 12/2016 | 0.5 Liter | Hassan General Store Khayyam Chowk Sargodha | Musaffa drops(Pvt)Ltd.Japan Road, Sihala Khurd Islamabad 051-4486631 |
| Ziran | BWK-32 | Sargodha | 25/07/2016 | - | 0.6 Liter | Railway Station Sargodha | Ziran Water(Pvt)Ltd Office#04,A-Block Model Town Lahore |
| Khush Aab | BWK-33 | Sargodha | 25/07/2016 | - | 0.6 Liter | Bismillah General Store 47 Adda Sargodha | A project of University of Sargodha (www.Khushaab.com) Faizan Communication INTL |
| Murree Sparkletts | BWK-34 | Sargodha | 25/07/2016 | - | 0.5 Liter | Aziz General Store Goal Chowk Sargodha | Murree Sparkletts (A division of Murree Brewery co.Ltd)plot No.10/2,phase 3 Industrial Estate, Hatter |
| Premier Fresh | BWK-35 | Sargodha | 25/07/2016 | 12/2017 | 0.6 Liter | Railway Station Sargodha | Zafir Industries:19-Km Near Highnoon Laboratories Multan Road Lahore |
| Hi-Fresh | BWK-36 | Sargodha | 25/07/2016 | 06/2017 | 0.6 Liter | Bismillah Khan General Bus Stand Sargodha | Product of NBFC Pakistan Madina Farm,84-N.B Sargodha. www.hi_freshwater.com |
| Pearl | BWK-37 | TandoJam | 10/08/2016 | 07/2017 | 0.6 Liter | 144/6.8 Km Near Toll plaza Super Highway Jamshoro. E-mail: pearlwater@gmail.com | 144/6.8 Km Near Toll plaza Super Highway Jamshoro. E-mail: pearlwater@gmail.com |

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|-----------------|------------|----------|--------------------|----------------|-----------|---|--|
| Nobel | BWK-38 | TandoJam | 10/08/2016 | 12/2017 | 0.6 Liter | Bottled by: Pak National Co. Lahore Tower Market Hakeem Habib Road Hyderabad | Bottled by: Pak National Co. Lahore Tower Market Hakeem Habib Road Hyderabad |
| Crystal Spring | BWK-39 | TandoJam | 10/08/2016 | 07/2017 | 0.6 Liter | Plot#28 Phase II Qasimabad Hyderabad www.crystalspringspk | Plot#28 Phase II Qasimabad Hyderabad www.crystalspringspk |
| Aqua Blue Drops | BWK-40 | TandoJam | 11/08/2016 | - | 0.6 Liter | Zam Zam Shop Rustam Shahzad Road Tando Jam | Bottled By: So-Safe Water Technology Karachi Zam Zam Shop Rustam Shahzad Road Tando Jam |
| Pak Life | BWK-41 | TandoJam | 10/08/2016 | 12/2017 | 0.6 Liter | Bottled by: Pak National Co. Lahore Tower Market Hakeem Habib Road Hyderabad | Bottled by: Pak National Co. Lahore Tower Market Hakeem Habib Road Hyderabad |
| AFRA | BWK-42 | TandoJam | 10/08/2016 | 12/2017 | 0.6 Liter | Bottled by: Pak National Co. Lahore Tower Market Hakeem Habib Road Hyderabad | Bottled by: Pak National Co. Lahore Tower Market Hakeem Habib Road Hyderabad |
| AQUA 20 | BWK-43 | TandoJam | 11/08/2016 | - | 0.6 Liter | Per Bux P.S Main Road Tando Jam | Sahil Beverages:Plot#97/198 Das House Hyderabad Road Matti Distt Badin e-mail: aqua20sahil@hotmail.com |
| Zam | BWK-44 | Multan | 08/08/2016 | - | 0.6 Liter | Sialavi Drink Corner Muzaffar Garh Bypass Multan | Bottled By: New MHN Drinks & Foods Makers(Pvt)Ltd.129/130 Sabzwari Town Multan |
| New Classic | BWK-45 | Multan | 08/08/2016 | 06/2017 | 0.6 Liter | Paramount General Store Dera Adda Chowk Multan | Bottled By: Classic Consumables Plot#74-B,Industrial Estate Phase II,Multan |
| Royal Oasis | BWK-46 | Multan | 09/08/2016 | - | 0.6 Liter | Mushtaq Drink Corner Vehari Chowk Multan | M&S food Beverages(Pvt)Ltd Islamabad www.royaltaffany.com |
| Well Care | BWK-47 | Multan | 09/08/2016 | - | 0.5 Liter | Nasir Hamid drink Corner General Bus Stand Multan | Manufactured by: Well care International (Pvt.) Ltd Khanewal Road Multan wellcare1222@gmail.com |
| National | BWK-48 | Multan | 09/08/2016 | - | 0.6 Liter | Nasir Hamid drink Corner General Bus Stand Multan | Nazir Enterprises: Dera Bakha Bahawalpur nazirenterprises500@gmail.com |
| Siiz Cool | BWK-49 | Multan | 08/08/2016 | - | 0.6 Liter | Sialavi Drink Corner Muzaffar Garh Bypass Multan | A Product Of Siiz Cool Marketing:1-Bandesha Street Near Madina Hospital Sabzazar Colony Bosan Road Multan Siizmarketing941@gmail.com |

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|--------------------|------------|------------|--------------------|----------------|-----------|---|--|
| | | | | | | | .com |
| New Lite Aqua | BWK-50 | Multan | 10/08/2016 | 03/2017 | 1.5 Liter | Ashraf Drink Corner Vehari Chowk Multan | Lite Aqua INTR: Bahawalpur Road Multan |
| Piyaas Plus | BWK-51 | Bahawalpur | 11/08/2016 | 02/2018 | 0.6 Liter | Time Pharmacy M.T.C Bahawalpur | Bottled by: Arshad Industries: Mouza Zakria, Samma Satta 59-A, Ghala Mandi Bahawalpur |
| Pine'o | BWK-52 | Bahawalpur | 11/08/2016 | 08/2017 | 0.6 Liter | Life Medical Store Opp.BVH Bahawalpur | Under Licence Gysing Pak PSIE, Bahawalpur. gysing@live.com |
| NN Water | BWK-53 | Bahawalpur | 11/08/2016 | 06/2017 | 0.6 Liter | Shan Sweets Bakers Railway Road Bahawalpur | A Project of South Punjab Guaranteed Purity and Great Taste For Life NN-Premium water factory Khanewal. E-mail: nnpwater@hotmail.com 065-2554390 |
| Aquafina | BWK-54 | Bahawalpur | 11/08/2016 | 07/2017 | 0.6 Liter | New United Medical Store Opp.BVH Bahawalpur | PEPSICO, Riaz Brothers (Pvt) Ltd, 32-N Gulberg II Lahore |
| Kinley | BWK-55 | Bahawalpur | 11/08/2016 | 05/2017 | 0.5 Liter | Life Medical Store Opp.BVH Bahawalpur | Coca Cola Beverages Pakistan Ltd S-E, 2 Gulberg III Lahore |
| Pure Fresh Water | BWK-56 | Bahawalpur | 11/08/2016 | 04/2017 | 0.6 Liter | Time Pharmacy M.T.C Bahawalpur | NLC bypass Main Khanewal road Multan Email: freshwater.pt@gmail.com |
| Nestle | BWK-57 | Bahawalpur | 11/08/2016 | 12/2017 | 0.5 Liter | Shan Sweets Bakers Railway Road Bahawalpur | Bottled By Nestle Pakistan Ltd. 308, Upper Mall Lahore Bottled by Nestle Pakistan Ltd |
| Wasser Drink Water | BWK-58 | Karachi | 24/08/2016 | | 0.6 Liter | Irfan shareen sweet & nimco shop Kara board malir | T-Traders & Marketing Landhi industries S.I.T.E area Karachi |
| Blue Plus | BWK-59 | Karachi | 24/08/2016 | | 0.6 Liter | Shaheed Bakers cold drink shop Green town Karachi | Q.N Traders Site Karachi |
| Pure Aqua | BWK-60 | Karachi | 24/08/2016 | | 0.6 Liter | Abdul Rehman Pan Shop Green town Karachi | Head Office: ST-B-2, Block 19, Gulshan-e-Ali Al-Noor More F.B Area Karachi |
| Global Water | BWK-61 | Karachi | 24/08/2016 | | 0.6 Liter | Khan General Stor Natha Khan Goth shah Faisal Karachi | Bottled By: JSD Enterprises Head Office Karachi 0333-7999489 |
| Al-massafi | BWK-62 | Karachi | 24/08/2016 | | 0.6 Liter | Bismillah General store Natha Khan Goth Shah Faisal Karachi | Al-massafi foods plot No.S-3,S-4 Malir city Karachi |
| Safe Water | BWK-63 | Karachi | 24/08/2016 | | 0.6 Liter | Hazara Hotel Shah Faisal No.3 (Natha Khan Goth) | Plot No.411, M.Colony Garden west Karachi www.safelife.pk |

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|---------------------------|------------|------------|--------------------|----------------|-----------|---|--|
| JEL | BWK-64 | Karachi | 24/08/2016 | 12/2018 | 0.6 Liter | Mehrab Bakers. Gabool Chorangi Karachi | Bottled By: Mega Fina Industries PlotNo.A-92, Malir Industrial Area Malir Karachi |
| Crystal Maya | BWK-65 | Karachi | 24/08/2016 | - | 0.6 Liter | Shan Cold drink shop Gabool Chorangi | A Product Of Asghar & Sons. |
| XERUS Water | BWK-66 | Karachi | 24/08/2016 | 12/2017 | 0.6 Liter | Quetta mobarik Hotel Gabool Chorangi | www.xeruswater.com |
| Glory | BWK-67 | Karachi | 24/08/2016 | - | 0.6 Liter | Amir General Store Cantt#6 | A Product Of S.S International :PlotNo13 Malir Industrial Area Malir Cant.C.P#3 Nearest Landmark KN Academy Karachi |
| New ARBO | BWK-68 | Karachi | 24/08/2016 | 12/2016 | 0.6 Liter | Pan Shop & General Store Madel Colony Karachi | Bottled By: Al-Haram enterprises 410/15B, Buffer Zone Karachi |
| Cottage Foods Drink Water | BWK-69 | Karachi | 24/08/2016 | 08/2017 | 0.6 Liter | New VIP darakshan General stor Kala Board Malir. | Cottage Foods:31-E, Sector 23 Korangi Industrial Area Karachi |
| MR. | BWK-70 | Karachi | 24/08/2016 | 03/2017 | 0.6 Liter | Al Darrosh Shop & General store natha khan shah faisal | B-138, Block 6 Gulishan-e-Iqbal Karachi 021-34960078 |
| SUPER NAMAL Water | BWK-71 | Karachi | 24/08/2016 | - | 0.6 Liter | Bismillah Milk Shop Gilistan-e-Johar Block-16 | Namalwater47@gmail.com |
| Livon | BWK-72 | Karachi | 24/08/2016 | - | 0.6 Liter | Pakeza cold drink Nath Khan Doth shah Faisal | A Product of Murtaza Traders: Suite No.2, Khizar Colony R-143, Z-4 Gulshan Maymar Karachi livonwater@gmail.com |
| Reliable | BWK-73 | Karachi | 24/08/2016 | - | 0.6 Liter | Ghazi Super Store Gulistan-e-Johar Block-16 Karachi | 0311-2294661 |
| Droplet | BWK-74 | Karachi | 24/08/2016 | - | 0.6 Liter | Ghazi Super Store Gulistan-e-Johar Block-16 Karachi | Bottled By: Makkah International Block-1-A, Gulishan-e-Johar Karachi |
| Vinh | BWK-75 | Karachi | 24/08/2016 | 12/2017 | 0.6 Liter | Memon store Gulistan-e-Johar Block-1 | A Product of AJ Pearl: Bankers Lodge Block J North Nazimabad Karachi info@vinhdrinkingwater.com |
| Ripple | BWK-76 | Rawalpindi | 20/09/2016 | 06/2017 | 1.5 Liter | Main Mirpur Road, Al-Noor Colony, sector 3, corner of st#6, behind Fazaia Colony Rawalpindi | Main Mirpur Road, Al-Noor Colony, sector 3, corner of st#6, behind Fazaia Colony Rawalpindi |
| Nectar | BWK-77 | Islamabad | 21/09/2016 | 06/2017 | 0.5 Liter | Islamabad Express Near Paradise Complex, Kuri Road Islamabad | Islamabad Express Near Paradise Complex, Kuri Road Islamabad |

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| Valley | BWK-78 | Islamabad | 20/09/2016 | 06/2017 | 1.5 Liter | Plot # 277, St.1, I-9/3 Industrial Area Islamabad | Plot # 277, St.1, I-9/3 Industrial Area Islamabad |
| Oxygen Plus | BWK-79 | Islamabad | 20/09/2016 | 05/2017 | 1.5 Liter | Reg.Trademark Of Care Enterprises Plot#86,st#10 sector I-9/2 Islamabad | Reg.Trademark Of Care Enterprises Plot#86,st#10 sector I-9/2 Islamabad |
| CALCI Dew | BWK-80 | Rawalpindi | 20/09/2016 | - | 1.5 Liter | Office#20-A Main talsa Road lalazar Rawalpindi | Office#20-A Main talsa Road lalazar Rawalpindi |
| Moya Mineral Water | BWK-81 | Peshawar | 04/10/2016 | 02/2018 | 1.5 Liter | Processed by: Al-Saudia Enterprises 580/B Main Gulberg Peshawar Cantt | Processed by: Al- Saudia Enterprises 580/B Main Gulberg Peshawar Cantt |
| Aqua Splash | BWK-82 | Peshawar | 04/10/2016 | | 0.5 Liter | Euro International) 192-A, Industrial Estate Hayatabad, Peshawar | 192-A, Industrial Estate Hyatabad Peshawar |
| Natural Aqwah | BWK-83 | Peshawar | 04/10/2016 | 10/2017 | 0.6 Liter | RG Enterprises: Plot#141 7,Industrial Estate Hayatabad Peshawar Web: www.aqwah.com | R&G Enterprises;- Plot#141-A, Industrial Estate Hayatabad Peshawar |
| Aquatic Fresh | BWK-84 | Peshawar | 04/10/2016 | | 0.6 Liter | Plot#1-C, Industrial Estate Hayatabad Peshawar | Royal Food Industries;- Plot#1-C, Industrial Estate Hayatabad Peshawar |
| Nebraska | BWK-85 | Peshawar | 04/10/2016 | 01/2017 | 0.6 Liter | Bottled at Dew Point Healthcare Water Purification and Processing Faciliti:12-C Industrial Estate Hayatabad, Peshawar | A product of Dew Point 12-C, Industrial Estate Hayatabad Peshawar |
| Fresh Life | BWK-86 | Peshawar | 04/10/2016 | 08/2016 | 0.6 Liter | 3km, Communications (Shirkat-e-zaryab) 107,A-SIE, Hyatabad Peshawar | 3km, Communications (Shirkat-e-zaryab) 107,A-SIE, Hyatabad Peshawar |
| Pacific Pure | BWK-87 | Lahore | 04/10/2016 | 09/2017 | 0.6 Liter | Bukhari sweet kot M.Hassan stop 16-km Multan road Lahore | Pacific Water Engineer G.T Road Lahore |
| OAS Water | BWK-88 | Lahore | 04/10/2016 | | 1.5 Liter | Sher-e-Rabani Pan shop shehpur uenjar stop Lahore | 93-Tariq Block,Garden Town Lahore |

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|-----------------------|------------|--------|--------------------|----------------|-----------|--|---|
| Aqua National | BWK-89 | Lahore | 04/10/2016 | 12/2017 | 0.6 Liter | Shop-1 Jianh Tarminal ada Thokar Niaz Baig Lahore | Bottled by: MILLI Brothers, 8-Km, G.T Road, Shahdara Lahore |
| Orizon | BWK-90 | Lahore | 04/10/2016 | | 0.6 Liter | Lal(red) store opposite Jinah Hospital Township Lahore | Orizon water 852-B Faisal Town Lahore |
| Scarle Nuturmil water | BWK-91 | Lahore | 04/10/2016 | 05/2017 | 1.5 Liter | Clinic + Opposite Jinah Hospital | Scarle Solution (Pvt)Ltd 1.5-Km Manga Raiwind Lahore |
| Aqua Gen | BWK-92 | Lahore | 04/10/2016 | 09/2017 | 1.5 Liter | Zam Zam Cafeteria Jinah Hospital Lahore | A Product of AquaGen Services Water Treatment Company 36-Civic Centre, Liaquat Chowk Sabzazaar Scheme, Lahore 042-37831365 www.aquagen.net.pk |
| Zuran | BWK-93 | Lahore | 04/10/2016 | 09/2017 | 1.5 Liter | Jianh Model Pharmacy Jinah Hospital Lahore | Ziran Water Office#4, A-Block Model Town Lahore |
| Kuality water | BWK-94 | Lahore | 04/10/2016 | - | 1.5 Liter | Waqas Super Store Township 11,12 Stop Lahore | Kuality Water Township Near 11,12 stop Lahore |
| Gourmet water | BWK-95 | Lahore | 04/10/2016 | 09/2017 | 1.5 Liter | Township Branch Gourment | Gourmet Foods: Gate#1, Plot 1-5, Sunder Industrial Estate, Rawind Sunder Road Lahore, Pakistan |
| Aab-e-Khoob | BWK-96 | Lahore | 04/10/2016 | 06/2017 | 0.6 Liter | Aab-e-Khoob, 9-17-B-1 Akbar Chowk Township Lahore | Aab-e-Khoob Plot # 9-17-B 1, College road, near Akbar Chowk, Township, Lahore 042-35214240 |
| Jami Water | BWK-97 | Lahore | 04/10/2016 | 08/2017 | 1.5 Liter | Jami water services 356-E PIA Housing Society Lahore | A Product of Jami Water Services: Khokhar Chowk, College Road, Township, Lahore 042-35511699 |
| Doce Water | BWK-98 | Lahore | 04/10/2016 | 09/2017 | 1.5 Liter | 48-M, Quaid-e-Azam Industrial State, Kot Lakhpat, Lahore www.doce.pk 042-35555555 | 48-M, Quaid-e-Azam Industrial State, Kot Lakhpat, Lahore www.doce.pk 042-35555555 |
| Butt Fresh Water | BWK-99 | Lahore | 04/10/2016 | - | 0.5 Liter | PIA Society Branch Butt Sweet Lahore | Manufactured By: Butt Sweets Bakers www.buttsweets.com |
| Naimat Water | BWK-100 | Lahore | 04/10/2016 | - | 1.5 Liter | Fatima Jinah Madical & General Store chowk Lahore | Water World boby plaza band road Lahore |
| Zum Water | BWK-101 | Lahore | 04/10/2016 | - | 0.6 Liter | Fatima Jinah Madical & General Store chowk Gengram -Lahore | NNK & Co Oile Katarwala |

PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



| Brand Name | PCRWR Code | City | Date of Collection | Date of Expiry | Size | Name & Address of Seller/Shop Keeper | Manufacturer's Address |
|---------------------|------------|-----------|--------------------|----------------|-----------|--|--|
| Dewan Water Express | BWK-102 | Lahore | 04/10/2016 | 09-2017 | 0.6 Liter | Umer Pharmacy & General Store Chowk Gengram Lahre | Bottled By: Dewan Foods:168,Shah Jamal Lahore |
| Aqua Safe | BWK-103 | Lahore | 04/10/2016 | 01/2017 | 0.5 Liter | General store beside saifullah Pharmacy Gengram Lahore | Aqua Safe Pakistan |
| Aab-e-Rahat | BWK-104 | Lahore | 04/10/2016 | - | 0.5 Liter | A.K Pharma plus Mazan groad Lahore | Chaudry Food Lahore |
| Blue Water | BWK-105 | Lahore | 04/10/2016 | - | 0.5 Liter | Saifullah Pharmacy Chowk Gengram Hospital Lahore | Al-Hilal industries (Pvt) Ltd Sultan Nagar Vehari Road Multan Pakistan |
| Cool Water | BWK-106 | Lahore | 04/10/2016 | 04/2017 | 0.5 Liter | 599-Airline Society Khyeban-e-Jinah,Gengram opd Conteen Lahore | M.T Miniral Water Company |
| Sama Water | BWK-107 | Islamabad | 20/09/2016 | - | 1.5 Liter | Qutbal Town Khana East Sanam Chowk Lehrar Road Islamabad | Qutbal Town Khana East Sanam Chowk Lehrar Road Islamabad |
| Sujo Punar | BWK-108 | Gilgit | 18/10/2-16 | 5/2017 | 0.6 | Sultan Ali Bakers Danyore Gilgit | Salar road upper Jutial,G-B,Pakistan sujopunar@gmail.com |
| VIVIDLE | BWK-109 | Gilgit | 18/10/2016 | 08/2017 | 0.5 Liter | Sultan Ali Bakers Danyore Gilgit | Bottled by VividLE Private Ltd: Near Old China Bridge,Danyora, Gilgit Vividle.waters@gmail.com |

WATER QUALITY PARAMETERS AND METHODS USED FOR ANALYSIS

WATER QUALITY PERMISSIBLE LIMITS FOR BOTTLED WATER

| Sr.# | Parameter | Units | Permissible Limits | | |
|------|--------------|---------|--------------------|------|-------|
| | | | WHO | IBWA | PSQCA |
| 1. | Alkalinity | (mg/l) | NGVS | NGVS | NGVS |
| 2. | Bicarbonate | (mg/l) | NGVS | NGVS | NGVS |
| 3. | Calcium | (mg/l) | NGVS | NGVS | 100 |
| 4. | Carbonate | (mg/l) | NGVS | NGVS | NGVS |
| 5. | Chloride | (mg/l) | 250 | 250 | 250 |
| 6. | Co lour | (TCU) | 15 | NGVS | 5 |
| 7. | Conductivity | (µS/cm) | NGVS | NGVS | NGVS |
| 8. | Fluoride | (mg/l) | 1.5 | 3 | 0.7 |
| 9. | Hardness | (mg/l) | NGVS | NGVS | NGVS |
| 10 | Iron | (mg/l) | 0.3 | 0.3 | 0.3 |



| Sr.# | Parameter | Units | Permissible Limits | | |
|------|-----------------|-----------|--------------------|------|-----------------|
| | | | WHO | IBWA | PSQCA |
| 11. | Magnesium | (mg/l) | NGVS | NGVS | 50 |
| 12. | Odor | - | Odorless | NGVS | Unobjectionable |
| 13. | Nitrate-N | (mg/l) | 10 | 10 | 10 |
| 14. | pH | - | 6.5-8.5 | NGVS | 6.5-8.5 |
| 15. | Potassium | (mg/l) | NGVS | NGVS | 10 |
| 16. | Sodium | (mg/l) | 200 | NGVS | 50 |
| 17. | Sulfate | (mg/l) | 250 | 250 | 250 |
| 18. | Taste | - | Unobject. | NGVS | Unobjectionable |
| 19. | TDS | (mg/l) | 1000 | 500 | 500 |
| 20. | Turbidity | (NTU) | 5 | NGVS | 0.5 |
| 21. | Phosphate | (mg/l) | NGVS | NGVS | NGVS |
| 22. | Arsenic | Ppb | 10 | 10 | 10 |
| 23. | Total Coliforms | MPN/100ml | 0 | 0 | 0 |
| 24. | E-Coli | MPN/100ml | 0 | 0 | 0 |

WHO World Health Organization
IBWA International Bottled Water Association
PSQCA Pakistan Standards and Quality Control Authority

SUMMARY OF RESULTS OF PCRWR MONITORING

CONTAMINANTS OF POTENTIAL CONCERNS FOUND IN BOTTLED WATER BRANDS

| Arsenic: Safe Limit : 10 parts per billion (ppb) | | | | | |
|--|---------------|--------|-----------------------|------|---------|
| Sr. No | Brand Name | Code | City of Manufacturing | Unit | Results |
| 1. | Well Care | BWK-47 | Lahore | ppb | 15 |
| 2. | Siiz Cool | BWK-49 | Multan | ppb | 18 |
| 3. | Pacific Pure | BWK-87 | Lahore | ppb | 28 |
| 4. | Aqua National | BWK-89 | Lahore | ppb | 60 |

| Sodium: Safe Limit : 50 parts per million (ppm) | | | | | |
|---|---------------|--------|-----------------------|------|---------|
| Sr. No | Brand Name | Code | City of Manufacturing | Unit | Results |
| 1. | Premier Fresh | BWK-35 | Lahore | ppm | 60 |
| 2. | Well Care | BWK-47 | Multan | ppm | 114 |
| 3. | National | BWK-48 | Bahawalpur | ppm | 115 |
| 4. | Blue Plus | BWK-59 | Karachi | ppm | 74 |
| 5. | New ARBO | BWK-68 | Karachi | ppm | 65 |
| 6. | Reliable | BWK-73 | Karachi | ppm | 68 |
| 7. | Pacific Pure | BWK-87 | Lahore | ppm | 90 |
| 8. | OAS Water | BWK-88 | Lahore | ppm | 68 |

| Potassium : Safe Limit : 10 parts per million (ppm) | | | | | |
|---|---------------------------|--------|-----------------------|------|---------|
| Sr. No | Brand Name | Code | City of Manufacturing | Unit | Results |
| 1. | Cottage Foods Drink Water | BWK-69 | Karachi | ppm | 14.4 |



PCRWR TESTING: SAFE BRANDS

| Sr. No | Brand Name | Code | Quality (Safe/Unsafe) | |
|--------|-------------------|--------|-----------------------|-----------------|
| | | | Chemical | Microbiological |
| 1. | Fresh Life | BWK-01 | Safe | Safe |
| 2. | MEHR | BWK-02 | Safe | Safe |
| 3. | Atlantic | BWK-03 | Safe | Safe |
| 4. | Hydr8 | BWK-04 | Safe | Safe |
| 5. | White Gold | BWK-05 | Safe | Safe |
| 6. | Maple Dew | BWK-06 | Safe | Safe |
| 7. | Deep Spring | BWK-07 | Safe | Safe |
| 8. | Verbena | BWK-08 | Safe | Safe |
| 9. | Hydra | BWK-09 | Safe | Safe |
| 10. | YAS | BWK-10 | Safe | Safe |
| 11. | Al Shalal | BWK-11 | Safe | Safe |
| 12. | Al-Haider | BWK-12 | Safe | Safe |
| 13. | OASIS Plus | BWK-13 | Safe | Safe |
| 14. | ECO | BWK-14 | Safe | Safe |
| 15. | JERS | BWK-15 | Safe | Safe |
| 16. | Isberg | BWK-16 | Safe | Safe |
| 17. | Bake Master | BWK-17 | Safe | Safe |
| 18. | Athar | BWK-18 | Safe | Safe |
| 19. | AQUA SAVE | BWK-19 | Safe | Safe |
| 20. | Rise Water | BWK-20 | Safe | Safe |
| 21. | ICE Well | BWK-21 | Safe | Safe |
| 22. | VINA | BWK-22 | Safe | Safe |
| 23. | Coral Water | BWK-23 | Safe | Safe |
| 24. | Roha Water | BWK-24 | Safe | Safe |
| 25. | Super Natural | BWK-25 | Safe | Safe |
| 26. | Pure Pani | BWK-26 | Safe | Safe |
| 27. | Aquwa Plus | BWK-27 | Safe | Safe |
| 28. | Blu Water | BWK-28 | Safe | Safe |
| 29. | Rachna | BWK-29 | Safe | Safe |
| 30. | Aab-e-Kausar | BWK-30 | Safe | Safe |
| 31. | Infinity | BWK-31 | Safe | Safe |
| 32. | Ziran | BWK-32 | Safe | Safe |
| 33. | Khush Aab | BWK-33 | Safe | Safe |
| 34. | Murree Sparkletts | BWK-34 | Safe | Safe |
| 35. | HI-Fresh | BWK-36 | Safe | Safe |
| 36. | Pearl | BWK-37 | Safe | Safe |
| 37. | Nobel | BWK-38 | Safe | Safe |
| 38. | Crystal Spring | BWK-39 | Safe | Safe |
| 39. | Aqua Blue Drops | BWK-40 | Safe | Safe |
| 40. | Pak Life | BWK-41 | Safe | Safe |
| 41. | AFRA | BWK-42 | Safe | Safe |
| 42. | AQUA 20 | BWK-43 | Safe | Safe |
| 43. | Zam | BWK-44 | Safe | Safe |
| 44. | New Classic | BWK-45 | Safe | Safe |
| 45. | Royal Oasis | BWK-46 | Safe | Safe |
| 46. | New Lite Aqua | BWK-50 | Safe | Safe |

PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



| Sr. No | Brand Name | Code | Quality (Safe/Unsafe) | |
|--------|-----------------------|---------|-----------------------|-----------------|
| | | | Chemical | Microbiological |
| 47. | Piyaas Plus | BWK-51 | Safe | Safe |
| 48. | Pine'o | BWK-52 | Safe | Safe |
| 49. | NN Water | BWK-53 | Safe | Safe |
| 50. | Aquafina | BWK-54 | Safe | Safe |
| 51. | Kinley | BWK-55 | Safe | Safe |
| 52. | Pure Fresh Water | BWK-56 | Safe | Safe |
| 53. | Nestle | BWK-57 | Safe | Safe |
| 54. | Wasser Drink Water | BWK-58 | Safe | Safe |
| 55. | Pure Aqua | BWK-60 | Safe | Safe |
| 56. | Global Water | BWK-61 | Safe | Safe |
| 57. | Al-massafi | BWK-62 | Safe | Safe |
| 58. | Safe Water | BWK-63 | Safe | Safe |
| 59. | JEL | BWK-64 | Safe | Safe |
| 60. | Crystal Maya | BWK-65 | Safe | Safe |
| 61. | XERUS Water | BWK-66 | Safe | Safe |
| 62. | Glory | BWK-67 | Safe | Safe |
| 63. | MR. | BWK-70 | Safe | Safe |
| 64. | SUPER NAMAL Water | BWK-71 | Safe | Safe |
| 65. | Livon | BWK-72 | Safe | Safe |
| 66. | Droplet | BWK-74 | Safe | Safe |
| 67. | Vinh | BWK-75 | Safe | Safe |
| 68. | Ripple | BWK-76 | Safe | Safe |
| 69. | Nectar | BWK-77 | Safe | Safe |
| 70. | Valley | BWK-78 | Safe | Safe |
| 71. | Oxygen Plus | BWK-79 | Safe | Safe |
| 72. | CALCI Dew | BWK-80 | Safe | Safe |
| 73. | Moya Mineral Water | BWK-81 | Safe | Safe |
| 74. | Aqua Splash | BWK-82 | Safe | Safe |
| 75. | Natural Aqwah | BWK-83 | Safe | Safe |
| 76. | Aquatic Fresh | BWK-84 | Safe | Safe |
| 77. | Nebraska | BWK-85 | Safe | Safe |
| 78. | Fresh Life | BWK-86 | Safe | Safe |
| 79. | Orizon | BWK-90 | Safe | Safe |
| 80. | Scarle Nuturmil water | BWK-91 | Safe | Safe |
| 81. | Aqua Gen | BWK-92 | Safe | Safe |
| 82. | Zuran | BWK-93 | Safe | Safe |
| 83. | Kuality water | BWK-94 | Safe | Safe |
| 84. | Gourmet water | BWK-95 | Safe | Safe |
| 85. | Aab-e-Khoob | BWK-96 | Safe | Safe |
| 86. | Jami Water | BWK-97 | Safe | Safe |
| 87. | Doce Water | BWK-98 | Safe | Safe |
| 88. | Water Fresh | BWK-99 | Safe | Safe |
| 89. | Naimat Water | BWK-100 | Safe | Safe |
| 90. | Zum Water | BWK-101 | Safe | Safe |
| 91. | Dewan Water Express | BWK-102 | Safe | Safe |
| 92. | Aqua Safe | BWK-103 | Safe | Safe |
| 93. | Aab-e-Rahat | BWK-104 | Safe | Safe |
| 94. | Blue Water | BWK-105 | Safe | Safe |



| Sr. No | Brand Name | Code | Quality (Safe/Unsafe) | |
|--------|------------|---------|-----------------------|-----------------|
| | | | Chemical | Microbiological |
| 95. | Cool Water | BWK-106 | Safe | Safe |
| 96. | Sama Water | BWK-107 | Safe | Safe |
| 97. | Sujo Punar | BWK-108 | Safe | Safe |
| 98. | VIVIDLE | BWK-109 | Safe | Safe |

PCRWR TESTING: UNSAFE BRANDS

| Sr. No | Brand Name | Code | Address/ Manufacturer | Quality (Safe/Unsafe) | |
|--------|---------------------------|--------|---|-----------------------|-----------------|
| | | | | Chemical | Microbiological |
| 1. | Premier Fresh | BWK-35 | Zafir Industries:19-Km Near Highnoon Laboratories Multan Road Lahore | Unsafe | Safe |
| 2. | Well Care | BWK-47 | Manufactured by: Well care International (Pvt.) Ltd Khanewal Road Multan wellcare1222@gmail.com | Unsafe | Safe |
| 3. | National | BWK-48 | Nazir Enterprises: Dera Bakha Bahawalpur nazirenterprises500@gmail.com | Unsafe | Safe |
| 4. | Siiz Cool | BWK-49 | A Product Of Siiz Cool Marketing:1-Bandesha Street Near Madina Hospital Sabzazar Colony Bosan Road Multan Siizmarketing941@gmail.com | Unsafe | Safe |
| 5. | Blue Plus | BWK-59 | Q.N Traders Site Karachi | Unsafe | Safe |
| 6. | New ARBO | BWK-68 | Bottled By: Al-Haram enterprises 410/15B, Buffer Zone Karachi | Unsafe | Safe |
| 7. | Cottage Foods Drink Water | BWK-69 | Cottage Foods:31-E, Sector 23 Korangi Industrial Area Karachi | Unsafe | Safe |
| 8. | Reliable | BWK-73 | 0311-2294661 | Unsafe | Safe |
| 9. | Pacific Pure | BWK-87 | Pacific Water Engineer G.T Road Lahore | Unsafe | Safe |
| 10. | OAS Water | BWK-88 | 93-Tariq Block, Garden Town Lahore | Unsafe | Safe |
| 11. | Aqua National | BWK-89 | Bottled by: MILLI Brothers, 8-Km, G.T Road, Shahdara Lahore | Unsafe | Safe |

MARKET CONSISTENCY IN TWO NEIGHBORING QUARTERS

| Sr. No | Consistent Brands | New Brands | Unavailable Brands |
|--------|-------------------|-------------|----------------------------|
| 1. | Murree Sparkletts | Hydr8 | Elixir |
| 2. | Khush Aab | Al-Haider | New Nation |
| 3. | Hi-Fresh | OASIS Plus | Rescue water |
| 4. | Infinity | Deep Spring | Bake Master |
| 5. | Super Natural | Verbena | Punjab Pure Drinking Water |
| 6. | Pure Pani | AQUA SAVE | Reel Water |
| 7. | Isberg | Rise Water | Osam |
| 8. | Rise Water | Roha Water | Pura Light |
| 9. | Eco | Pure Pani | Orion |
| 10. | Jers | Aquwa Plus | Deosai |
| 11. | Ice Well | Ziran | Venora |

PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



| | | | |
|-----|---------------------|---------------------------|--------------------|
| 12. | Al Shalal | Rachna | Ripple |
| 13. | Coral water | Aab-e-Kausar | Miracle |
| 14. | Athar | Premier Fresh | Naafey Pure |
| 15. | Pure Fresh Water | Aqua Blue Drops | ARBO |
| 16. | Well care | AQUA 20 | Aqua Neel |
| 17. | Royal Oasis | New Lite Aqua | Al-Habib |
| 18. | Vinah | National | Aqua Boon |
| 19. | Blue Plus | Zam | Al-Sahar |
| 20. | Safe Life | New Classic | Vey |
| 21. | Deep Spring | Wasser Drink Water | Askari |
| 22. | Al-massafi | Pure Aqua | Aqua Pure alkaline |
| 23. | Hydra | Global Water | Aqua Classic |
| 24. | Oxygen | Crystal Maya | Aqua Hygiencic |
| 25. | MR | XERUS Water | Drop Ice |
| 26. | Livon | Glory | Hi Pure |
| 27. | Droplet | New ARBO | Sav Life |
| 28. | Blu Water | Cottage Foods Drink Water | Q2 Plus |
| 29. | Kinley | Reliable | Aqua Lite Water |
| 30. | N.N Water | SUPER NAMAL Water | Krisko Water |
| 31. | Nestle Pure Life | Pacific Pure | Bling |
| 32. | Pineo | OAS Water | Deep Rock Water |
| 33. | Piyass | Aqua National | Nation |
| 34. | Aqua fina | Orizon | KLINZ Water |
| 35. | Samma Safe Life | Scarle Nuturmil water | Dura Pure Life |
| 36. | Maple Dew | Zuran | Effort |
| 37. | Calci Dew | Kuality water | Iman Water |
| 38. | Yas | Aab-e-Khoob | Royal Blue |
| 39. | Natural Aqwah | Zum Water | Pure it |
| 40. | Aqua Spalash | Aab-e-Rahat | Aftab Qarshi |
| 41. | Nebraska | Fresh Life | NEC |
| 42. | Aquatic fresh | Sujo Punar | Sufi Water |
| 43. | Moya mineral water | VIVIDLE | Aab-e-Rahat |
| 44. | Pearl | | Definet |
| 45. | Afra | | BERG |
| 46. | Pak Life | | Water Plus |
| 47. | Noble | | Aab-e-Khoob |
| 48. | Aqua National | | Nation |
| 49. | Doce | | |
| 50. | Aqua Gen | | |
| 51. | Naimat | | |
| 52. | Cool Pure | | |
| 53. | Jami Water | | |
| 54. | Aqua safe | | |
| 55. | Gourmet | | |
| 56. | Dewan Water Express | | |
| 57. | Siiz cool | | |
| 58. | Atlantic | | |
| 59. | Fresh Life | | |
| 60. | White Gold | | |
| 61. | Mehr | | |
| 62. | Nectar | | |



| | | | |
|-----|-----------------|--|--|
| 63. | Valley | | |
| 64. | Crystal Spring | | |
| 65. | Aqua Plus | | |
| 66. | But Fresh water | | |

DISEASE POTENTIAL FROM CONTAMINATED BOTTLED WATER

| Sr. No | Contaminant | Diseases Impacts |
|--------|--------------------------------------|--|
| 1. | Bacteriological Contamination | Cholera, Diarrhea, Dysentery, Hepatitis, Typhoid |
| 2. | Arsenic | Cancer (lungs, bladder, skin, prostate, kidney, nose and liver), diabetes kidney diseases, hypertension, heart diseases, birth defects, black foot diseases. |
| 3. | Sodium | Hypertension |
| 4. | Potassium | Hyperkalimia |

CONCLUSIONS

| Sr. No | Item | Conclusion | |
|--------|--|------------|-------|
| | | No. | % age |
| 1. | Total No. of Brands Collected | 109 | - |
| 2. | Overall safe brands | 98 | 90 |
| 3. | No. of overall unsafe brands | 11 | 10 |
| 4. | No. of Chemically safe brands | 98 | 90 |
| 5. | No. of Chemically unsafe brands | 11 | 10 |
| 6. | No. of Microbiologically safe brands | 109 | 100 |
| 7. | No. of Microbiologically unsafe brands | 0 | 0 |
| 8. | No. of Consistent brands in Market | 66 | 61 |
| 9. | No. of brands disappeared from market | 48 | 44 |
| 10. | No. of new brands | 43 | 39 |

Detailed water quality status of each bottled water brand is available at **Annexure-1**

PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



Annexure-1

Chemical and Microbiological Quality of Bottled/Mineral Water Brands

| Brand Name | Brand Code | Turbidity | pH | EC | TDS | Ca | Mg | Hard | HCO ₃ | Cl | Na | F | PO ₄ | Fe | K | NO ₃ | SO ₄ | CO ₃ | As | * Microbiological Contaminants | |
|-------------------------------|------------|-----------|-----------|-------|-----|-----|-----|------|------------------|-----|-----|------|-----------------|------|-----|-----------------|-----------------|-----------------|-----|--------------------------------|----------------|
| PSQCA Bottled Water Standards | - | 0.5 | 6.5 - 8.5 | NGVS | 500 | 100 | 50 | NGVS | NGVS | 250 | 50 | 0.7 | NGVS | 0.3 | 10 | 10 | 250 | NGV S | 10 | Total Coliform 0/100ml | E-Coli 0/100ml |
| Detection Limits | - | 0.2 | 0.02 | 0.287 | - | 2 | 1 | 5 | 5 | 2 | 1 | 0.03 | 0.03 | 0.03 | 0.2 | 0.06 | 0.4 | | 0.1 | - | - |
| Units | - | NTU | | μS/cm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | Ppm | ppm | | ppb | MPN /100ml | MPN /100ml |
| Fresh Life | BWK-01 | BDL | 7.10 | 379 | 208 | 40 | 19 | 180 | 180 | 12 | 13 | 0.11 | BDL | BDL | 1.2 | 0.2 | 26 | BDL | BDL | Nil | Nil |
| MEHR | BWK-02 | BDL | 6.37 | 194 | 162 | 20 | 19 | 130 | 100 | 48 | 26 | 0.07 | BDL | BDL | 0.6 | 1.2 | 17 | BDL | BDL | Nil | Nil |
| Atlantic | BWK-03 | BDL | 6.98 | 381 | 210 | 52 | 12 | 180 | 200 | 14 | 10 | 0.07 | BDL | BDL | 1.6 | 0.2 | 26 | BDL | BDL | Nil | Nil |
| Hydr8 | BWK-04 | BDL | 6.83 | 348 | 191 | 40 | 12 | 150 | 90 | 40 | 16 | 0.04 | BDL | BDL | 0.8 | BDL | 38 | BDL | BDL | Nil | Nil |
| White Gold | BWK-05 | BDL | 7.04 | 305 | 168 | BDL | 24 | 100 | 90 | 42 | 32 | BDL | BDL | BDL | 0.2 | 2 | 20 | BDL | 0.5 | Nil | Nil |
| Maple Dew | BWK-06 | BDL | 7.01 | 257 | 141 | 32 | 5 | 100 | 90 | 20 | 11 | 0.17 | BDL | BDL | 0.9 | 0.8 | 8 | BDL | 1 | Nil | Nil |
| Deep Spring | BWK-07 | BDL | 6.99 | 374 | 206 | 50 | 7 | 155 | 150 | 16 | 10 | 0.19 | BDL | BDL | 1 | 1.5 | 21 | BDL | BDL | Nil | Nil |
| Verbena | BWK-08 | BDL | 6.80 | 411 | 226 | 56 | 5 | 160 | 110 | 48 | 20 | 0.14 | BDL | BDL | 0.9 | BDL | 28 | BDL | BDL | Nil | Nil |
| Hydra | BWK-09 | BDL | 7.16 | 396 | 218 | 52 | 7 | 160 | 190 | 16 | 28 | 0.24 | BDL | BDL | 1 | 1.3 | 14 | BDL | BDL | Nil | Nil |
| YAS | BWK-10 | BDL | 6.94 | 467 | 257 | 60 | 10 | 190 | 25 | 12 | 13 | 0.15 | BDL | BDL | 1.8 | 1 | 21 | BDL | BDL | Nil | Nil |
| Al Shalal | BWK-11 | BDL | 7.43 | 398 | 219 | 40 | 22 | 190 | 245 | BDL | 20 | 0.18 | BDL | BDL | 4.5 | BDL | BDL | BDL | BDL | Nil | Nil |
| Al-Haider | BWK-12 | BDL | 7.14 | 130 | 83 | BDL | 12 | 50 | 45 | 15 | 14 | BDL | BDL | BDL | 0.6 | BDL | 16 | BDL | 1 | Nil | Nil |
| OASIS Plus | BWK-13 | BDL | 7.52 | 446 | 245 | 20 | 29 | 170 | 200 | 20 | 34 | 0.05 | BDL | BDL | 2.7 | BDL | 19 | 5 | 1 | Nil | Nil |
| ECO | BWK-14 | BDL | 7.55 | 400 | 220 | 16 | 12 | 90 | 100 | 50 | 48 | BDL | BDL | BDL | 0.6 | BDL | 31 | BDL | 1 | Nil | Nil |
| JERS | BWK-15 | BDL | 7.12 | 350 | 193 | 40 | 6 | 125 | 60 | 72 | 23 | BDL | BDL | BDL | 0.7 | BDL | 20 | BDL | 2 | Nil | Nil |
| Isberg | BWK-16 | BDL | 7.19 | 271 | 149 | 28 | 7 | 100 | 70 | 50 | 21 | BDL | BDL | BDL | 0.6 | BDL | 5 | 20 | 0.5 | Nil | Nil |

The highlighted results indicate the concentration level beyond the PSQCA Bottled Water Standards.

July-September, 2016

PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



| Brand Name | Brand Code | Turbidity | pH | EC | TDS | Ca | Mg | Hard | HCO ₃ | Cl | Na | F | PO ₄ | Fe | K | NO ₃ | SO ₄ | CO ₃ | As | * Microbiological Contaminants | |
|-------------------------------|------------|-----------|-----------|-------|-----|-----|-----|------|------------------|-----|-----------|------|-----------------|------|-----|-----------------|-----------------|-----------------|-----|--------------------------------|----------------|
| PSQCA Bottled Water Standards | - | 0.5 | 6.5 - 8.5 | NGVS | 500 | 100 | 50 | NGVS | NGVS | 250 | 50 | 0.7 | NGVS | 0.3 | 10 | 10 | 250 | NGVS | 10 | Total Coliform 0/100ml | E-Coli 0/100ml |
| Detection Limits | - | 0.2 | 0.02 | 0.287 | - | 2 | 1 | 5 | 5 | 2 | 1 | 0.03 | 0.03 | 0.03 | 0.2 | 0.06 | 0.4 | | 0.1 | - | - |
| Units | - | NTU | | μS/cm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | Ppm | ppm | | ppb | MPN /100ml | MPN /100ml |
| Bake Master | BWK-17 | BDL | 7.25 | 3.79 | 208 | 46 | 9 | 150 | 80 | 60 | 18 | BDL | BDL | BDL | 0.9 | BDL | 30 | BDL | 1 | Nil | Nil |
| Athar | BWK-18 | BDL | 7.70 | 501 | 276 | 36 | 22 | 180 | 245 | 16 | 41 | 0.19 | BDL | BDL | 4.3 | BDL | 6 | BDL | 0.8 | Nil | Nil |
| AQUA SAVE | BWK-19 | BDL | 6.80 | 318 | 175 | 40 | 12 | 150 | 65 | 60 | 10 | BDL | BDL | BDL | 0.3 | BDL | 20 | BDL | 1 | Nil | Nil |
| Rise Water | BWK-20 | BDL | 7.13 | 134 | 74 | 6 | 8 | 48 | 56 | 12 | 11 | BDL | BDL | BDL | 0.6 | BDL | BDL | 25 | 1 | Nil | Nil |
| ICE Well | BWK-21 | BDL | 7.22 | 336 | 185 | 28 | 10 | 110 | 60 | 48 | 23 | BDL | BDL | BDL | 0.3 | BDL | 31 | BDL | 2 | Nil | Nil |
| VINA | BWK-22 | BDL | 6.52 | 304 | 167 | 40 | 5 | 120 | 65 | 38 | 15 | BDL | BDL | BDL | 0.3 | BDL | 33 | BDL | BDL | Nil | Nil |
| Coral Water | BWK-23 | BDL | 6.94 | 341 | 188 | 44 | 5 | 130 | 50 | 60 | 15 | BDL | BDL | BDL | BDL | BDL | 30 | BDL | 0.9 | Nil | Nil |
| Roha Water | BWK-24 | BDL | 7.08 | 289 | 159 | 35 | 8 | 120 | 40 | 55 | 6 | BDL | BDL | BDL | 0.2 | BDL | 20 | BDL | BDL | Nil | Nil |
| Super Natural | BWK-25 | BDL | 6.65 | 346 | 190 | 12 | 5 | 70 | 45 | 48 | 44 | 0.10 | BDL | BDL | 1.5 | 0.46 | 56 | BDL | BDL | Nil | Nil |
| Pure Pani | BWK-26 | BDL | 7.32 | 354 | 195 | 36 | 10 | 130 | 100 | 30 | 21 | BDL | BDL | BDL | 5.2 | BDL | 35 | BDL | 0.8 | Nil | Nil |
| Aquwa Plus | BWK-27 | BDL | 5.65 | 125 | 69 | BDL | 7 | 30 | 20 | 12 | 14 | BDL | BDL | BDL | 0.6 | BDL | 28 | BDL | 1 | Nil | Nil |
| Blu Water | BWK-28 | BDL | 7.12 | 347 | 191 | 34 | 12 | 130 | 30 | 72 | 16 | BDL | BDL | BDL | 0.3 | BDL | 32 | BDL | 1 | Nil | Nil |
| Rachna | BWK-29 | BDL | 7.52 | 404 | 222 | 28 | 5 | 90 | 130 | 48 | 50 | BDL | BDL | BDL | 1.2 | BDL | 12 | BDL | 0.5 | Nil | Nil |
| Aab-e-Kausar | BWK-30 | BDL | 6.14 | 450 | 248 | 56 | 17 | 210 | 140 | 50 | 22 | BDL | BDL | BDL | 0.6 | BDL | 48 | BDL | 0.8 | Nil | Nil |
| Infinity | BWK-31 | BDL | 7.29 | 351 | 193 | 32 | 12 | 130 | 60 | 45 | 22 | BDL | BDL | BDL | BDL | 2 | 50 | BDL | BDL | Nil | Nil |
| Ziran | BWK-32 | BDL | 7.03 | 357 | 196 | 32 | 7 | 110 | 50 | 72 | 28 | BDL | BDL | BDL | BDL | BDL | 20 | BDL | BDL | Nil | Nil |
| Khush Aab | BWK-33 | BDL | 7.01 | 269 | 148 | 36 | 5 | 110 | 40 | 64 | 9 | BDL | BDL | BDL | 0.2 | BDL | BDL | BDL | 1 | Nil | Nil |
| Murree Sparkletts | BWK-34 | BDL | 7.90 | 357 | 196 | 32 | 18 | 155 | 160 | 12 | 16 | 0.17 | BDL | BDL | 0.9 | BDL | 17 | BDL | 0.8 | Nil | Nil |
| Premier Fresh | BWK-35 | BDL | 7.60 | 407 | 224 | 20 | 10 | 90 | 150 | 24 | 60 | BDL | BDL | BDL | 1.7 | BDL | 35 | BDL | 1.4 | Nil | Nil |

The highlighted results indicate the concentration level beyond the PSQCA Bottled Water Standards.

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PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



| Brand Name | Brand Code | Turbidity | pH | EC | TDS | Ca | Mg | Hard | HCO ₃ | Cl | Na | F | PO ₄ | Fe | K | NO ₃ | SO ₄ | CO ₃ | As | * Microbiological Contaminants | |
|-------------------------------|------------|-----------|-----------|-------|-----|-----|-----|------|------------------|-----|-----|------|-----------------|------|-----|-----------------|-----------------|-----------------|-----|--------------------------------|----------------|
| PSQCA Bottled Water Standards | - | 0.5 | 6.5 - 8.5 | NGVS | 500 | 100 | 50 | NGVS | NGVS | 250 | 50 | 0.7 | NGVS | 0.3 | 10 | 10 | 250 | NGVS | 10 | Total Coliform 0/100ml | E-Coli 0/100ml |
| Detection Limits | - | 0.2 | 0.02 | 0.287 | - | 2 | 1 | 5 | 5 | 2 | 1 | 0.03 | 0.03 | 0.03 | 0.2 | 0.06 | 0.4 | | 0.1 | - | - |
| Units | - | NTU | | μS/cm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | Ppm | ppm | | ppb | MPN /100ml | MPN /100ml |
| Hi-Fresh | BWK-36 | BDL | 7.17 | 263 | 145 | 8 | 12 | 70 | 50 | 39 | 32 | BDL | BDL | BDL | 0.2 | 1 | 32 | BDL | 0.8 | Nil | Nil |
| Pearl | BWK-37 | BDL | 7.47 | 361 | 199 | 50 | 9 | 160 | 35 | 72 | 6 | 0.04 | BDL | BDL | 3.2 | BDL | 40 | BDL | 1.1 | Nil | Nil |
| Nobel | BWK-38 | BDL | 7.21 | 235 | 129 | 36 | 2 | 100 | 25 | 33 | 12 | 0.09 | BDL | BDL | 1 | BDL | 50 | BDL | 0.2 | Nil | Nil |
| Crystal Spring | BWK-39 | BDL | 7.44 | 307 | 169 | 32 | 10 | 120 | 60 | 36 | 17 | 0.05 | BDL | BDL | 3.2 | BDL | 40 | BDL | 0.6 | Nil | Nil |
| Aqua Blue Drops | BWK-40 | BDL | 7.33 | 419 | 230 | 4 | 32 | 140 | 30 | 125 | 24 | BDL | BDL | BDL | 6.4 | BDL | BDL | BDL | 0.2 | Nil | Nil |
| Pak Life | BWK-41 | BDL | 6.88 | 218 | 120 | 4 | 12 | 60 | 10 | 24 | 17 | 0.10 | BDL | BDL | 1 | BDL | 57 | BDL | 1.2 | Nil | Nil |
| AFRA | BWK-42 | BDL | 7.19 | 237 | 130 | 16 | 10 | 80 | 20 | 46 | 17 | 0.12 | BDL | BDL | 1 | BDL | 32 | BDL | BDL | Nil | Nil |
| AQUA 20 | BWK-43 | BDL | 6.98 | 205 | 113 | BDL | 10 | 40 | 35 | 36 | 29 | 0.05 | BDL | BDL | 0.3 | BDL | 19 | BDL | 0.2 | Nil | Nil |
| Zam | BWK-44 | BDL | 7.81 | 480 | 264 | 44 | 19 | 190 | 110 | 48 | 27 | 0.22 | BDL | BDL | 3.3 | BDL | 67 | BDL | BDL | Nil | Nil |
| New Classic | BWK-45 | BDL | 7.79 | 387 | 213 | 32 | 10 | 120 | 65 | 62 | 28 | 0.05 | BDL | BDL | 1.1 | BDL | 34 | BDL | 2 | Nil | Nil |
| Royal Oasis | BWK-46 | BDL | 7.76 | 652 | 359 | 32 | 27 | 190 | 210 | 24 | 50 | 0.29 | BDL | BDL | 5 | BDL | 61 | BDL | 9.8 | Nil | Nil |
| Well Care | BWK-47 | BDL | 7.48 | 865 | 476 | 40 | 24 | 200 | 240 | 48 | 114 | 0.26 | BDL | BDL | 5.2 | BDL | 129 | BDL | 15 | Nil | Nil |
| National | BWK-48 | BDL | 7.82 | 865 | 476 | 44 | 22 | 200 | 246 | 50 | 115 | 0.46 | BDL | BDL | 5.4 | BDL | 135 | BDL | 0.9 | Nil | Nil |
| Siiz Cool | BWK-49 | BDL | 7.72 | 727 | 125 | 16 | 10 | 80 | 95 | 12 | 28 | 0.04 | BDL | BDL | 2.1 | BDL | 13 | BDL | 18 | Nil | Nil |
| New Lite Aqua | BWK-50 | BDL | 7.14 | 388 | 213 | 44 | 12 | 160 | 100 | 24 | 17 | 0.21 | BDL | BDL | 2.8 | BDL | 64 | BDL | 3 | Nil | Nil |
| Piyaas Plus | BWK-51 | BDL | 7.80 | 574 | 316 | 52 | 12 | 180 | 145 | 75 | 50 | 0.19 | BDL | BDL | 2.2 | BDL | 40 | BDL | 7 | Nil | Nil |
| Pine'o | BWK-52 | BDL | 7.49 | 371 | 204 | 36 | 12 | 140 | 60 | 72 | 21 | BDL | BDL | BDL | 0.2 | BDL | 27 | BDL | 2 | Nil | Nil |
| NN Water | BWK-53 | BDL | 7.28 | 355 | 195 | 16 | 13 | 95 | 70 | 55 | 36 | BDL | BDL | BDL | 0.3 | BDL | 25 | BDL | 2 | Nil | Nil |
| Aquafina | BWK-54 | BDL | 7.38 | 222 | 122 | 4 | 15 | 70 | 30 | 18 | 18 | 0.05 | BDL | BDL | 1 | BDL | 55 | BDL | BDL | Nil | Nil |

The highlighted results indicate the concentration level beyond the PSQCA Bottled Water Standards.

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PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



| Brand Name | Brand Code | Turbidity | pH | EC | TDS | Ca | Mg | Hard | HCO ₃ | Cl | Na | F | PO ₄ | Fe | K | NO ₃ | SO ₄ | CO ₃ | As | * Microbiological Contaminants | |
|-------------------------------|------------|-----------|-----------|-------|-----|-----|-----|------|------------------|-----|-----|------|-----------------|------|------|-----------------|-----------------|-----------------|-----|--------------------------------|----------------|
| PSQCA Bottled Water Standards | - | 0.5 | 6.5 - 8.5 | NGVS | 500 | 100 | 50 | NGVS | NGVS | 250 | 50 | 0.7 | NGVS | 0.3 | 10 | 10 | 250 | NGVS | 10 | Total Coliform 0/100ml | E-Coli 0/100ml |
| Detection Limits | - | 0.2 | 0.02 | 0.287 | - | 2 | 1 | 5 | 5 | 2 | 1 | 0.03 | 0.03 | 0.03 | 0.2 | 0.06 | 0.4 | | 0.1 | - | - |
| Units | - | NTU | | µS/cm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | Ppm | ppm | | ppb | MPN /100ml | MPN /100ml |
| Kinley | BWK-55 | BDL | 7.80 | 315 | 173 | 34 | 12 | 135 | 50 | 10 | 7 | 0.15 | BDL | BDL | 2.5 | BDL | 80 | BDL | BDL | Nil | Nil |
| Pure Fresh Water | BWK-56 | BDL | 7.27 | 329 | 181 | 24 | 12 | 110 | 60 | 54 | 23 | 0.10 | BDL | BDL | 6.6 | BDL | 30 | BDL | 1 | Nil | Nil |
| Nestle | BWK-57 | BDL | 7.70 | 443 | 244 | 50 | 13 | 180 | 70 | 84 | 18 | BDL | BDL | BDL | 0.3 | BDL | 32 | BDL | BDL | Nil | Nil |
| Wasser Drink Water | BWK-58 | BDL | 7.87 | 355 | 195 | 20 | 10 | 80 | 40 | 72 | 35 | 0.58 | BDL | BDL | 3.3 | BDL | 32 | BDL | BDL | Nil | Nil |
| Blue Plus | BWK-59 | BDL | 6.64 | 487 | 268 | 16 | 5 | 60 | 80 | 90 | 74 | 0.08 | BDL | BDL | 4.6 | 1.5 | 18 | BDL | BDL | Nil | Nil |
| Pure Aqua | BWK-60 | BDL | 7.15 | 376 | 207 | 40 | 12 | 150 | 80 | 26 | 24 | 0.15 | BDL | BDL | 6.4 | BDL | 71 | BDL | BDL | Nil | Nil |
| Global Water | BWK-61 | BDL | 6.98 | 302 | 166 | 20 | 10 | 90 | 50 | 62 | 28 | 0.02 | BDL | BDL | 1.2 | BDL | 14 | BDL | BDL | Nil | Nil |
| Al-massafi | BWK-62 | BDL | 6.82 | 251 | 138 | BDL | 19 | 80 | 30 | 75 | 24 | BDL | BDL | BDL | 3.4 | 2 | 4 | BDL | BDL | Nil | Nil |
| Safe Water | BWK-63 | BDL | 6.87 | 336 | 185 | 12 | 15 | 90 | 30 | 72 | 29 | 0.17 | BDL | BDL | 3.7 | BDL | 27 | BDL | 1 | Nil | Nil |
| JEL | BWK-64 | BDL | 6.76 | 224 | 123 | 20 | 7 | 80 | 25 | 48 | 15 | 0.04 | BDL | BDL | 0.3 | BDL | 20 | BDL | BDL | Nil | Nil |
| Crystal Maya | BWK-65 | BDL | 7.06 | 465 | 256 | 20 | 22 | 140 | 80 | 82 | 42 | 0.23 | BDL | BDL | 3.2 | BDL | 39 | BDL | BDL | Nil | Nil |
| XERUS Water | BWK-66 | BDL | 7.70 | 250 | 275 | 32 | 5 | 100 | 25 | 60 | 13 | BDL | BDL | BDL | 0.5 | BDL | 17 | BDL | BDL | Nil | Nil |
| Glory | BWK-67 | BDL | 8.5 | 309 | 170 | 36 | 6 | 115 | 40 | 60 | 18 | BDL | BDL | BDL | 0.3 | BDL | 25 | BDL | BDL | Nil | Nil |
| New ARBO | BWK-68 | BDL | 7.11 | 349 | 192 | BDL | 7 | 30 | 50 | 76 | 65 | 0.07 | BDL | BDL | 1.1 | BDL | 14 | BDL | BDL | Nil | Nil |
| Cottage Foods Drink Water | BWK-69 | BDL | 8.29 | 350 | 193 | 22 | 16 | 120 | 60 | 58 | 21 | 0.04 | BDL | BDL | 14.4 | BDL | 40 | BDL | BDL | Nil | Nil |
| MR. | BWK-70 | BDL | 7.06 | 353 | 194 | BDL | 15 | 60 | 30 | 74 | 50 | 0.23 | BDL | BDL | 0.5 | BDL | 35 | BDL | BDL | Nil | Nil |

The highlighted results indicate the concentration level beyond the PSQCA Bottled Water Standards.

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PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



| Brand Name | Brand Code | Turbidity | pH | EC | TDS | Ca | Mg | Hard | HCO ₃ | Cl | Na | F | PO ₄ | Fe | K | NO ₃ | SO ₄ | CO ₃ | As | * Microbiological Contaminants | |
|-------------------------------|------------|-----------|-----------|-------|-----|-----|-----|------|------------------|-----|-----------|------|-----------------|------|-----|-----------------|-----------------|-----------------|-----|--------------------------------|----------------|
| PSQCA Bottled Water Standards | - | 0.5 | 6.5 - 8.5 | NGVS | 500 | 100 | 50 | NGVS | NGVS | 250 | 50 | 0.7 | NGVS | 0.3 | 10 | 10 | 250 | NGVS | 10 | Total Coliform 0/100ml | E-Coli 0/100ml |
| Detection Limits | - | 0.2 | 0.02 | 0.287 | - | 2 | 1 | 5 | 5 | 2 | 1 | 0.03 | 0.03 | 0.03 | 0.2 | 0.06 | 0.4 | | 0.1 | - | - |
| Units | - | NTU | | μS/cm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | Ppm | ppm | | ppb | MPN /100ml | MPN /100ml |
| SUPER NAMAL Water | BWK-71 | BDL | 6.5 | 449 | 247 | 36 | 10 | 130 | 45 | 106 | 40 | 0.04 | BDL | BDL | 6.7 | BDL | 24 | BDL | BDL | Nil | Nil |
| Livon | BWK-72 | BDL | 6.84 | 345 | 190 | BDL | 15 | 60 | 35 | 74 | 48 | BDL | BDL | BDL | 0.7 | 1.5 | 30 | BDL | 3.5 | Nil | Nil |
| Reliable | BWK-73 | BDL | 7.69 | 506 | 278 | 8 | 17 | 90 | 70 | 82 | 68 | 0.29 | BDL | BDL | 4 | BDL | 58 | BDL | BDL | Nil | Nil |
| Droplet | BWK-74 | BDL | 7.46 | 283 | 156 | 16 | 18 | 115 | 40 | 60 | 14 | 0.25 | BDL | BDL | 0.6 | BDL | 20 | BDL | BDL | Nil | Nil |
| Vinh | BWK-75 | BDL | 7.21 | 368 | 202 | 56 | 7 | 155 | 50 | 62 | 13 | 0.31 | BDL | BDL | 0.6 | BDL | 45 | BDL | BDL | Nil | Nil |
| Ripple | BWK-76 | BDL | 6.87 | 450 | 248 | 32 | 27 | 190 | 45 | 108 | 12 | BDL | BDL | BDL | 1.7 | BDL | 19 | BDL | 2 | Nil | Nil |
| Nectar | BWK-77 | BDL | 7.14 | 427 | 235 | 56 | 10 | 180 | 170 | 24 | 20 | 0.12 | BDL | BDL | 1.8 | 4.1 | 27 | BDL | BDL | Nil | Nil |
| Valley | BWK-78 | BDL | 7.72 | 284 | 156 | 36 | 10 | 130 | 110 | 10 | 7 | 0.21 | BDL | BDL | 1.3 | 1 | 35 | BDL | 1 | Nil | Nil |
| Oxygen Plus | BWK79 | BDL | 6.96 | 399 | 219 | 36 | 10 | 130 | 125 | 48 | 40 | 0.07 | BDL | BDL | 0.9 | BDL | 29 | BDL | 1 | Nil | Nil |
| CALCI Dew | BWK-80 | BDL | 6.84 | 284 | 156 | 26 | 5 | 110 | 100 | 35 | 12 | 0.13 | BDL | BDL | 1.1 | 1.5 | 6 | BDL | 2 | Nil | Nil |
| Moya Mineral Water | BWK-81 | BDL | 7.06 | 275 | 151 | 24 | 12 | 110 | 90 | 24 | 14 | BDL | BDL | BDL | 1.2 | 1.5 | 18 | BDL | 1 | Nil | Nil |
| Aqua Splash | BWK-82 | BDL | 6.68 | 366 | 201 | 21 | 13 | 120 | 84 | 70 | 28 | BDL | BDL | BDL | 0.7 | 2 | BDL | BDL | BDL | Nil | Nil |
| Natural Aqwah | BWK-83 | BDL | 7.09 | 381 | 210 | 32 | 15 | 140 | 50 | 70 | 18 | BDL | BDL | BDL | BDL | BDL | 30 | BDL | BDL | Nil | Nil |
| Aquatic Fresh | BWK-84 | BDL | 7.63 | 594 | 327 | 64 | 22 | 250 | 200 | 34 | 21 | 0.24 | BDL | BDL | 2.3 | 4.8 | 44 | BDL | 0.7 | Nil | Nil |
| Nebraska | BWK-85 | BDL | 7.35 | 381 | 210 | 40 | 15 | 160 | 60 | 72 | 10 | BDL | BDL | BDL | BDL | BDL | 20 | BDL | BDL | Nil | Nil |

The highlighted results indicate the concentration level beyond the PSQCA Bottled Water Standards.

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PCRWR QUARTERLY REPORT-BOTTLED WATER QUALITY



| Brand Name | Brand Code | Turbidity | pH | EC | TDS | Ca | Mg | Hard | HCO ₃ | Cl | Na | F | PO ₄ | Fe | K | NO ₃ | SO ₄ | CO ₃ | As | * Microbiological Contaminants | |
|-------------------------------|------------|-----------|-----------|-------|-----|-----|-----|------|------------------|-----|-----|------|-----------------|------|-----|-----------------|-----------------|-----------------|------|--------------------------------|----------------|
| PSQCA Bottled Water Standards | - | 0.5 | 6.5 - 8.5 | NGVS | 500 | 100 | 50 | NGVS | NGVS | 250 | 50 | 0.7 | NGVS | 0.3 | 10 | 10 | 250 | NGVS | 10 | Total Coliform 0/100ml | E-Coli 0/100ml |
| Detection Limits | - | 0.2 | 0.02 | 0.287 | - | 2 | 1 | 5 | 5 | 2 | 1 | 0.03 | 0.03 | 0.03 | 0.2 | 0.06 | 0.4 | | 0.1 | - | - |
| Units | - | NTU | | µS/cm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | Ppm | ppm | | ppb | MPN /100ml | MPN /100ml |
| Fresh Life | BWK-86 | BDL | 6.95 | 383 | 211 | 48 | 12 | 170 | 60 | 80 | 17 | BDL | BDL | BDL | 0.6 | 0.2 | 26 | BDL | BDL | Nil | Nil |
| Pacific Pure | BWK-87 | BDL | 7.78 | 488 | 304 | 16 | 7 | 70 | 210 | 19 | 90 | 0.24 | BDL | BDL | BDL | BDL | 45 | BDL | 28 | Nil | Nil |
| OAS Water | BWK-88 | BDL | 6.99 | 474 | 288 | 20 | 12 | 100 | 160 | 48 | 68 | 0.31 | BDL | BDL | BDL | BDL | 44 | BDL | 2.90 | Nil | Nil |
| Aqua National | BWK-89 | BDL | 7.5 | 802 | 457 | 84 | 30 | 335 | 215 | 96 | 40 | 0.19 | BDL | BDL | 0.2 | 0.15 | 77 | BDL | 60 | Nil | Nil |
| Orizon | BWK-90 | BDL | 7.04 | 385 | 227 | 40 | 6 | 125 | 85 | 77 | 34 | 0.12 | BDL | BDL | 0.2 | BDL | 19 | BDL | BDL | Nil | Nil |
| Scarle Nuturmil water | BWK-91 | BDL | 7.7 | 187 | 112 | 12 | 9 | 65 | 40 | 29 | 14 | 0.04 | BDL | BDL | 1.6 | BDL | 23 | BDL | BDL | Nil | Nil |
| Aqua Gen | BWK-92 | BDL | 6.52 | 302 | 187 | 24 | 8 | 95 | 85 | 48 | 32 | 0.05 | BDL | BDL | 0.2 | BDL | 23 | BDL | BDL | Nil | Nil |
| Zuran | BWK-93 | BDL | 6.61 | 420 | 248 | 46 | 7 | 145 | 65 | 96 | 34 | 0.08 | BDL | BDL | 0.3 | BDL | 25 | BDL | BDL | Nil | Nil |
| Kuality water | BWK-94 | BDL | 7.44 | 385 | 237 | 28 | 11 | 115 | 80 | 58 | 42 | BDL | BDL | BDL | 0.2 | BDL | 50 | BDL | 5.30 | Nil | Nil |
| Gourmet water | BWK-95 | BDL | 7.19 | 412 | 229 | 42 | 7 | 135 | 55 | 86 | 30 | 0.01 | BDL | BDL | 0.2 | 0.30 | 29 | BDL | BDL | Nil | Nil |
| Aab-e-Khoob | BWK-96 | BDL | 7.35 | 418 | 229 | 36 | 2 | 100 | 90 | 67 | 49 | 0.08 | BDL | BDL | 0.3 | BDL | 20 | BDL | 0.98 | Nil | Nil |
| Jami Water | BWK-97 | BDL | 7 | 394 | 226 | 32 | 4 | 100 | 90 | 67 | 44 | BDL | BDL | BDL | 0.2 | 2.48 | 13 | BDL | BDL | Nil | Nil |
| Doce Water | BWK-98 | BDL | 6.68 | 320 | 179 | 26 | 11 | 110 | 55 | 48 | 21 | 0.01 | BDL | BDL | 0.2 | BDL | 40 | BDL | BDL | Nil | Nil |
| Butt Fresh Water | BWK-99 | BDL | 6.71 | 445 | 252 | 38 | 9 | 130 | 90 | 48 | 48 | 0.03 | BDL | BDL | BDL | BDL | 55 | BDL | 1.26 | Nil | Nil |

The highlighted results indicate the concentration level beyond the PSQCA Bottled Water Standards.

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| Brand Name | Brand Code | Turbidity | pH | EC | TDS | Ca | Mg | Hard | HCO ₃ | Cl | Na | F | PO ₄ | Fe | K | NO ₃ | SO ₄ | CO ₃ | As | * Microbiological Contaminants | |
|-------------------------------|------------|-----------|-----------|-------|-----|-----|-----|------|------------------|-----|-----|------|-----------------|------|-----|-----------------|-----------------|-----------------|------|--------------------------------|----------------|
| PSQCA Bottled Water Standards | - | 0.5 | 6.5 - 8.5 | NGVS | 500 | 100 | 50 | NGVS | NGVS | 250 | 50 | 0.7 | NGVS | 0.3 | 10 | 10 | 250 | NGVS | 10 | Total Coliform 0/100ml | E-Coli 0/100ml |
| Detection Limits | - | 0.2 | 0.02 | 0.287 | - | 2 | 1 | 5 | 5 | 2 | 1 | 0.03 | 0.03 | 0.03 | 0.2 | 0.06 | 0.4 | | 0.1 | - | - |
| Units | - | NTU | | μS/cm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | ppm | Ppm | ppm | | ppb | MPN /100ml | MPN /100ml |
| Naimat Water | BWK-100 | BDL | 7.71 | 330 | 177 | 28 | 7 | 100 | 70 | 57 | 25 | 0.05 | BDL | BDL | 0.3 | BDL | 17 | BDL | 5.5 | Nil | Nil |
| Zum Water | BWK-101 | BDL | 6.51 | 334 | 181 | 36 | 2 | 100 | 50 | 67 | 25 | 0.03 | BDL | BDL | 0.2 | 1.01 | 16 | BDL | BDL | Nil | Nil |
| Dewan Water Express | BWK-102 | BDL | 7.05 | 338 | 182 | 32 | 10 | 120 | 45 | 67 | 19 | 0.03 | BDL | BDL | 0.2 | BDL | 27 | BDL | 1.97 | Nil | Nil |
| Aqua Safe | BWK-103 | BDL | 7.48 | 384 | 224 | 20 | 12 | 100 | 100 | 43 | 42 | 0.09 | BDL | BDL | 0.2 | BDL | 47 | BDL | 6.10 | Nil | Nil |
| Aab-e-Rahat | BWK-104 | BDL | 6.55 | 341 | 182 | 32 | 12 | 130 | 45 | 81 | 17 | 0.7 | BDL | BDL | 0.3 | BDL | 13 | BDL | 1.12 | Nil | Nil |
| Blue Water | BWK-105 | BDL | 6.93 | 328 | 173 | 32 | 10 | 120 | 25 | 62 | 17 | 0.05 | BDL | BDL | 0.2 | BDL | 38 | BDL | 1.95 | Nil | Nil |
| Cool Water | BWK-106 | BDL | 7.22 | 327 | 181 | 28 | 7 | 100 | 55 | 52 | 28 | 0.12 | BDL | BDL | 0.2 | BDL | 35 | BDL | BDL | Nil | Nil |
| SAMAA Water | BWK-107 | BDL | 7.06 | 390 | 215 | 44 | 10 | 150 | 130 | 30 | 16 | 0.12 | BDL | BDL | 0.8 | 0.8 | 12 | BDL | BDL | Nil | Nil |
| Sujo Punar | BWK-108 | BDL | 7.08 | 260 | 143 | 44 | BDL | 110 | 30 | 56 | 5 | 0.14 | BDL | BDL | 1.7 | 1 | 20 | BDL | BDL | Nil | Nil |
| VIVIDLE | BWK-109 | BDL | 7.19 | 260 | 143 | 32 | 5 | 100 | 45 | 54 | 13 | BDL | BDL | BDL | 0.6 | 1.8 | 17 | BDL | BDL | Nil | Nil |

NGVS =No Guideline Value Set-

BDL = Below Detection Limits-

* Microbiological results have also been verified by IDEXX (Quanti-Tray/2000 USA) and Membrane Filtration (CFU/100ml, 9222-B&D APHA) Methods.

The highlighted results indicate the concentration level beyond the PSQCA Bottled Water Standards.

July-September, 2016