

**Minutes of a Meeting of the Environmental Authority
Held on Wednesday, 24 April 2024
At the Department of Environment and Natural Resources, Botanical Gardens, Paget
and Remotely using Teams Teleconference**

PRESENT: Ms. Davida Morris, Chair (by remote access)
Mr. Eugene Saunders, Deputy Chair
Mr. Willie Ferguson, Member (by remote access)
Mr. Harry Matthie, Member
Mr. Jonathan Starling, Member (by remote access)

ADVISORS: Dr. Geoff Smith, Environmental Engineer, DENR
Dr. Shaun Lavis, Hydrogeologist, DENR
Ms. Patricia Hollis, Environmental Officer, DENR
Mr. Tarik Christopher, Acting Chief Engineer, Public Works (by remote access)
Mr. Armell Thomas, Acting Chief Environmental Health Officer
Ms. Crystal Baxter, Environmental Health Officer

IN ATTENDANCE:

Mr. Mark Husdan, Solid Waste Manager, MPW Waste Management
Ms. Vanese Flood Gordon, Waste, Education & Enforcement Officer, MPW
Mr. Chris Williamson, Sites Management Officer, MPW
Ms. Charlita Richardson, Depot Foreman, MPW

ABSENT: Mr. Andrew Barnes, Member
Mr. James Morrison, Member
Mr. Paul McDonald, Acting Senior Planner, Dept. of Planning

1. Confirmation of Minutes

Minutes of the meeting No. 392 held on 27 March 2024 were approved and signed by the Deputy Chair.

2. BELCO Operating Licence OL-114 Application for Reissue

The Authority **TOOK NOTE:**

that the draft OL-114 conditions had been circulated to BELCO for comment before the operating licence was issued. Should BELCO request changes, these will be brought back to the Environmental Authority for consideration.

3. BELCO Complaints—March

It was reported that the March report showed that 4 soot complaints were received for events occurring on 11th, 13th, 15th and 17th March. There was one odour/fume complaint on 10th March 2024.

4. Tynes Bay Waste Facility March Update

4.1 Due to time constraints, this matter was deferred.

5. Mediwaste Ltd - Clinical Waste Facility Update

Mr. Starling recused himself from this matter.

The Authority **TOOK NOTE** that:

5.1 A meeting was held on 8th March 2024 between Ministry of Public Works, Dept of Environment and Natural Resources, and Mediwaste Ltd.

5.2 The volume of waste generated at Mediwaste so far suggests that two to four years' worth of ash could be stored in one 20 ft shipping container.

5.3 Sites at the Airport Waste Management Facility were viewed where such filled shipping containers could be stored prior to being completely filled with Tynes Bay ash-concrete slurry.

5.4 Mediwaste were recommended to collect and store the bagged ash in a 20-foot container located at their site.

5.5 Mediawaste were advised to store all unprocessed waste either in a 20-foot container or inside their building.

6. CP-814, OL-1257 Ministry of Public Works Asphalt and Screening Plant

The Authority was reminded that at the last meeting, it granted approval for a construction permit and operating licence for an asphalt plant at the Government Quarry, Hamilton Parish, with the conditions being deferred pending amendment.

The Authority **APPROVED:**

the proposed changes to the asphalt plant construction permit and operating licence and agreed that they would become standard conditions for all asphalt plants.

7. Presentation by Ministry of Public Works on Airport Waste Management Facility 2018-2023 (OL-168)

The Solid Waste Section, Ministry of Public Works, representatives gave a presentation on the operation of the Airport Waste Management Facility (AWMF) for Fiscal Years 2018/2019 to 2022/2023.

7.1 Materials Accepted for Disposal:

The AWMF accepts large electrical appliances (eg refrigerators, freezers, CRT TVs, etc), E-Waste for which there is not currently a market in the USA; vehicles, fibreglass, metal wastes, tyres, construction & demolition wastes and TBWEF incinerator ash. It was noted that the weigh scale at the AWMF is still not operational but is expected to be so later this year.

The ash is processed into ash block, ash pancakes or direct buried as unconsolidated ash, depending on availability of trucks and cement or the need for ash pancakes for surface stability or ash blocks for the construction of new cells for infill.

7.2 Challenges at the Plant

7.2.1 Fires:

The fire on 19 December 2023 (cause unknown) burned for 8-days. The Ministry of Public Works is still waiting for the Bermuda Fire & Rescue Service's final report. Being subterranean in nature, it was difficult to extinguish.

7.2.2 Vehicle and Lithium Batteries:

With there being no worldwide policy for recycling or disposal, lithium batteries from vehicles these are currently being stockpiled in a containment area. Risk of fire is high, so storing and exporting them is problematic.

7.2.3 Backlog of Mediawaste Containers of Clinical Waste

Twenty-one (21) containers filled with clinical waste have been stored at the AWMF for about 18 months pending incineration by Mediawaste. These wastes accumulated after the KEMH steam sterilizers were decommissioned and before the Mediawaste facility was operational. This backlog of containers is slowly being treated, with the contents of 3 having been incinerated to date.

7.3 Future of the AWMF Site

7.3.1 In 2024/25, a feasibility study will be undertaken to review materials accepted at the site and review current operations, including improving inspections and sorting of incoming wastes.

7.3.2 Working with Keep Bermuda Beautiful (KBB), there will be a cleanup of the beaches in Castle Harbour near the AWMF.

7.3.3 There was discussion on the creation of the next cell expected to be constructed in mid-May. The water depth of the new cell is expected to be 45-ft and will require pylons to be driven, fencing to contain floating dunnage and a large number of concrete ash block and heavy metal objects to 'construct' the perimeter. It is expected to accommodate about 18 months' worth of waste.

The Solid Waste Representatives were thanked for their presentation on the Airport Waste Management Facility operations.

The Authority AGREED:

to consider the operating licence reissue application and conditions at their next meeting.

8. Proposal for Legacy Asbestos and Clinical Waste Ash Disposal at AWMF

The Members were reminded that there are approximately 750 twenty-foot shipping containers filled with asbestos that have been in storage at the Government Quarry, Baileys Bay and at BLDC St. Davids for several decades awaiting disposal.

Since 2017, 500 containers worth of asbestos have been shipped abroad for disposal in an appropriate landfill where any subsequent liability does not fall back on Bermuda. The current annual budget of \$300,000 provides for 50 containers per year to be shipped. It is estimated to take a further 11 years and \$4.2 million to dispose of the remaining asbestos overseas. However, many of the containers have degraded to the point where they are not structurally sound and some have been infilled with concrete in preparation for deep sea disposal that was not carried out. These would be very expensive to repackage, if it is even possible to reduce the occupational risk sufficiently for such an activity to occur. It was noted that occupational, public health and environmental risks may increase with time while the containers are stored in the environment.

A proposal was presented to bury the remaining containers of asbestos, together with any containers of Medi-waste ash (See Minutes 28 Feb. 2024), at a defined, purposely constructed site at the Airport Waste Management Facility. Several options for cell construction were presented as were steps to ensure safe transfer of asbestos and clinical waste ash to the site.

The Authority gave **APPROVAL IN PRINCIPLE:**

for the burial of asbestos containers and medical waste incinerator ash at the AWMF subject to an independent review of the proposed landfill construction and the receipt of the necessary permits/approvals from other Authorities (eg, Dept of Health, Bermuda Airport Authority, etc.).

9. Applications for Construction Permits and Operating Licences (New)

9.1 CP-816, OL-1234 Anthony Pearman

The Authority **APPROVED:**

the construction permit and operating licence applications for a 100 kW diesel generator at 51 Middle Road, Warwick, subject to standard conditions.

9.2 CP-817, OL-1259 Rubis Energy Bermuda Ltd.

The Authority **APPROVED:**

the construction permit and operating licence applications for a 55 kW diesel generator at 15 Blue Hole Hill, Hamilton Parish, subject to standard conditions.

9.3 CP-818, OL-1260 Rubis Energy Bermuda Ltd.

The Authority **APPROVED:**

the construction permit and operating licence applications for a 80 kW diesel generator at 25/27 Crow Lane, Pembroke, subject to standard conditions.

9.4 CP-819, OL-1261 Rozy Azhar

The Authority **DEFERRED:**

the construction permit and operating licence applications for a 22 kW propane generator at 5 Sunset Pass, Pembroke, pending submission of additional information.

9.5 CP-820, OL-1262 Bermuda Hospitals Board MAWI

The Authority **APPROVED:**

the construction permit and operating licence applications for a 130 kW diesel generator at 44 Devon Spring Road, Devonshire, subject to standard conditions.

9.6 CP-821, OL-1263 Robert Landau

The Authority **APPROVED**:

the construction permit and operating licence applications for a 23 kW diesel generator at 2 Glebe Road, St. George's, subject to standard conditions.

9.7 CP-822, OL-1264 Jesse DeCouto

The Authority **APPROVED**:

the construction permit and operating licence applications for one 23 kW propane generator at 146 Somerset Road, Sandys, subject to standard conditions.

9.8 CP-823, OL-1265 Derek Myles

The Authority **APPROVED**:

the construction permit and operating licence applications for a 60 kW diesel generator at 9 Addendum Lane, Pembroke, subject to standard conditions.

9.9 CP-663, OL-1256 Market Place

The Authority **APPROVED**:

the construction permit and operating licence applications for a 225 kW diesel generator at 22 Middle Road, Warwick, subject to standard conditions.

9.10 Other Market Place Generators

The Members **TOOK NOTE**:

that the Market Place owns 18 generators, all for essential services; some in varying states of repair and some at locations other than where they held licenced for. DENR continues to work with the Market Place to bring all licences current.

The Authority **APPROVED**, subject to standard conditions:

CP-824, OL-1266 one 225 kW diesel generator at 10 Mill Lane Pembroke

CP-825, OL-1268 one 350 kW diesel generator at 1 Mill Creek Road

OL-1267 350 kW mobile diesel genset for use at 1 Mill Creek Road

OL-1269 250 kW diesel generator (replacement) at 110 North Shore Road, Hamilton Parish

9.11 OL-1271 Sail GP F50 League Bermuda Ltd

The Authority **APPROVED**:

the operating licence application for a 20 kW diesel-fired generator at Morgan's Point, Constitution Road, subject to standard conditions.

10. Applications for Construction Permits and Operating Licences (Reissues)

10.1 The Authority **APPROVED**:

the applications for reissue of operating licences listed on the two-page printout, subject to standard conditions, with the exception of one application: OL-1114 Crosswinds Rental waste-water treatment plant, which was deferred pending submission of the annual report.

10.2 The Authority **APPROVED**:

OL-004 Public Works Tynes Bay Waste to Energy Facility, subject to the same conditions as before.

OL-142 Corporation of Hamilton Sewage Plant, Front Street, subject to the same conditions as before.

OL-390 Belmont Golf Villas waste-water treatment plant, subject to the same conditions as before.

OL-881 Amis Memorial Chapel crematorium, subject to the same conditions as before and the requirement to have soil samples analysed for heavy metals and dioxin/furan signatures before the end of December 2024.

11. Import Permit for Refrigerants

11.1 The Authority **APPROVED**:

the application submitted by Self Made Maintenance for the import of twelve 6-ounce cans of R600 subject to standard conditions.

12. Applications for Water Rights (New)

12.1 The Authority APPROVED:

WR 4806 Pitt and Company domestic water right for the disposal of rainwater in a car park at 9 Happy Valley Road, Devonshire, subject to standard conditions.

12.2 The Authority APPROVED:

WR 4807 Bermuda Hospitals Board domestic water right for the disposal of rainwater in a car park at MAWI, 44 Devon Spring Road, Devonshire, subject to standard conditions.

12.3 The Authority APPROVED:

WR 4819 John Collis domestic water right for household supply at Lot 6 Castle Road, Warwick, subject to standard conditions.

12.4 The Authority APPROVED:

WR 4820 John Collis domestic water right for household RO disposal at Lot 6 Castle Road, Warwick subject to standard conditions and providing a licence for the RO unit is secured from the Department of Health.

13. Applications for Water Rights (Reissues)

13.1 The Authority APPROVED:

the reissuance of Water Rights on the two-page printout, subject to standard conditions, with the exception of one indicated as withdrawn.

13.2 The Authority APPROVED:

WR 5738 Dr. Snaith revision of water right from a sewage effluent borehole at 20 Queen Street to commercial abstraction well for onsite household supply

13.3 The Authority APPROVED:

the proposed amendment in reporting requirements for WR 5715 to 5734 BELCO Hydrocarbon Recovery and Monitoring Wells.

14. Date of the Next Meeting

The next meeting was scheduled for 8:30 am, Wednesday, 29th May 2024 in the DENR Boardroom, Botanical Gardens, Paget



CHAIRMAN

29 May 2024

DATE

