

WESTERN SAHARA

MINE ACTION REVIEW

CLEARING THE MINES 2024

KEY DATA

ANTI-PERSONNEL (AP) MINE CONTAMINATION: HEAVY

MINE ACTION REVIEW ESTIMATE

50km²

AP MINE
CLEARANCE IN 2023

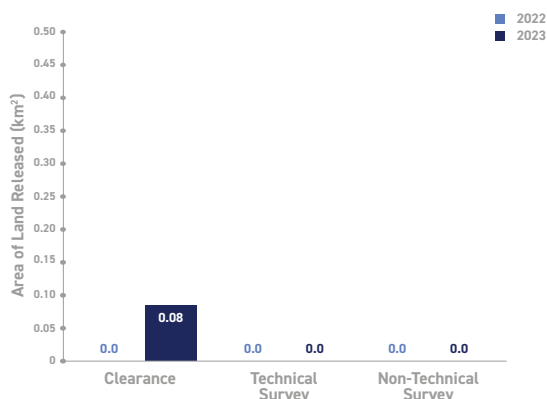
0.08km²

(MIXED MINEFIELD
CLEARANCE)

AP MINES
DESTROYED IN 2023

1

LAND RELEASE OUTPUT



RECOMMENDATIONS FOR ACTION

- The Saharawi Arab Democratic Republic should reaffirm its written commitment to respect and implement the Anti-Personnel Mine Ban Convention (APMBC), including clearance of all anti-personnel mines east of the Berm, consonant with its international human rights obligations. This commitment should include the annual submission of a voluntary Article 7 report.
- The Saharawi Mine Action Coordination Office (SMACO) should draft a new strategy, including a new deadline for completion of clearance of anti-personnel (AP) mines, with annual survey and clearance targets and a detailed budget.
- Greater support should be provided to SMACO to enable it to continue to coordinate mine action east of the Berm, and to ensure that capacity development efforts are not wasted.
- Mine action in Western Sahara must not become forgotten or overlooked by the international community. Support must still be given to address the remaining mine, cluster munition, and other explosive ordnance contamination.

DEMINING CAPACITY

MANAGEMENT CAPACITY

- Saharawi Mine Action Coordination Office (SMACO)
[Western Sahara, east of the Berm]
- Royal Moroccan Army [Western Sahara, west of the Berm]

NATIONAL OPERATORS

- Royal Moroccan Army (RMA)

INTERNATIONAL OPERATORS

- SafeLane Global

OTHER ACTORS

- United Nations Mine Action Service (UNMAS)
Western Sahara

UNDERSTANDING OF AP MINE CONTAMINATION

The exact extent of mine contamination across Western Sahara is not known, although the areas along the Berm¹ contain some of the densest mine contamination in the world. The contamination is a result of fighting in previous decades between the Royal Moroccan Army (RMA) and the Popular Front for the Liberation of Saguia el Hamra and Rio de Oro (Polisario Front) forces. According to the United Nations Mine Action Service (UNMAS), the primary mine threat in Western Sahara east of the Berm—excluding the Berm itself, restricted areas, and the buffer strip—is from anti-vehicle (AV) mines rather than AP mines; and cluster munition remnants (CMR) are also a major hazard.² No areas suspected or confirmed to contain solely AP mines remain to the east of the Berm.

Most mine contamination identified during ongoing and historical clearance efforts was from AV mines though some areas previously thought to contain only AV mines were found

to also contain AP mines following non-technical survey (NTS) conducted in the Agwanit Area of Responsibility.³ In 2023, the UN Mission for the Referendum in Western Sahara (MINURSO) identified a probable additional threat of AP mines in the Territory. MINURSO has continued to advocate for the parties to the conflict to share detailed information on where renewed fighting had taken place and the types of munitions used so that it could update the mine action database.⁴

At the end of 2023, land in Western Sahara to the east of the Berm contained a total of 24 areas confirmed or suspected to contain mixed AP and AV mine contamination covering a total of 213km² (see Table 1).⁵ This is an increase from the previous year when contamination totalled nearly 212km² across 25 areas.⁶ UNMAS reported that no previously unrecorded AP mine contamination was added to Western Sahara's information management database in 2023.⁷

Table 1: Mined area east of the Berm (at end 2023)⁸

Types of contamination	CHAs	Area (km ²)	SHAs	Area (km ²)	Total CHAs and SHAs	Total area (km ²)
AP/AV mines	10	58.54	14	154.57	24	213.11
Totals	10	58.54	14	154.57	24	213.11

CHA = Confirmed hazardous area. SHA = Suspected hazardous area.

Both the north and south of Western Sahara are known or suspected to contain AP mines, with the 24 areas covering an estimated total size of 213km² remaining at the end of 2023, as set out in Table 2.⁹

Table 2: Mined area containing AP mines by province east of the Berm (at end 2023)¹⁰

Province	CHAs	Area (km ²)	SHAs	Area (km ²)	Total CHAs and SHAs	Total area (km ²)
North Region	5	0.28	3	4.11	8	4.39
South Region	5	58.26	11	150.46	16	208.72
Totals	10	58.54	14	154.57	24	213.11

In September 2018, UNMAS reported that following NTS efforts, east of the Berm, 10 of the then 27 mined areas remained, covering an estimated total of almost 120km². These areas, which are located within the 5km-wide buffer strip, are not accessible for clearance.¹¹ Clearance of the buffer strip of mines and explosive remnants of war (ERW)

is not foreseen in the MINURSO Military Agreements No. 2 (with the Polisario Front) and No. 3 (with the RMA). This, according to the UN, considerably limits the ability of MINURSO military observers to patrol and verify developments.¹² No survey or clearance of the buffer strip was conducted during 2023.¹³

1 A 2,700km-long defensive wall, the Berm was built during the conflict, of which 1,465km divides the territory between Morocco on the west and the Polisario Front on the east. The Berm is 12 times the length of the erstwhile Berlin Wall and second in length today only to the Great Wall of China.

2 Email from Graeme Abernethy, UNMAS, 1 March 2018.

3 Emails from Leon Louw, Programme Manager, UNMAS, 30 March 2021; Edwin Faigmane, Programme Officer, UNMAS, 18 June 2020; Robert Thompson, Chief of Operations, UNMAS, 31 July 2019; Graeme Abernethy, UNMAS, 1 March 2018; and Virginie Auger, UNMAS, 29 March 2017.

4 Report of the Secretary-General, Situation concerning Western Sahara, UN doc. S/2023/729, 3 October 2023, para. 52.

5 Email from Elhadji Kebe, Chief, Mine Action Programme, UNMAS, 16 May 2024.

6 Email from Elhadji Kebe, UNMAS, 25 April 2023.

7 Email from Elhadji Kebe, UNMAS, 16 May 2024.

8 Ibid

9 Ibid.

10 Ibid.

11 Email from Graeme Abernethy, UNMAS, 14 September 2018. The buffer strip is an area 5km wide east of the Berm. MINURSO, "Ceasefire Monitoring Overview", undated but accessed 1 June 2016, at: <http://bit.ly/2Yxg1nv>.

12 "Report of the Secretary-General on the situation concerning Western Sahara", UN doc. S/2017/307, 10 April 2017, p. 8; and email from Edwin Faigmane, UNMAS, 6 August 2020.

13 Email from Elhadji Kebe, UNMAS, 16 May 2024.

The RMA controls territory to the west of the Berm where it has been conducting large-scale demining. According to UNMAS, the RMA cooperates with the MINURSO mine action component and submits regular monthly reports of its activities in the territory, west of the Berm, helping to build a clearer understanding of the mine and ERW threat across Western Sahara.¹⁴

OTHER EXPLOSIVE ORDNANCE CONTAMINATION

Western Sahara also has a significant problem from CMR and other ERW (see Mine Action Review's *Clearing Cluster Munition Remnants 2024* report on Western Sahara for further information).¹⁵

PROGRAMME MANAGEMENT

UNMAS Western Sahara, formerly the MINURSO Mine Action Coordination Centre (MACC), facilitates MINURSO monitoring of the ceasefire and ensures the safe passage of UN personnel. On 30 October 2023, under UN Security Council Resolution 2703, MINURSO's mandate was extended for an additional 12 months to 31 October 2024.

UNMAS Western Sahara serves as the UN focal point for mine action activities within the MINURSO area of operations. Its contracted teams work only in areas east of the Berm. The RMA conducts its own demining in areas west of the Berm. In 2013–14, the Polisario Front, with UN support, established the Saharawi Mine Action Coordination Office (SMACO), which is responsible for coordinating mine action activities in Western Sahara east of the Berm, excluding the buffer strip.¹⁶

In 2023, \$27,499 was provided to SMACO and UNMAS received \$2,010,171 for survey and clearance.¹⁷

GENDER AND DIVERSITY

UNMAS has reported that gender policies are implemented in accordance with UNMAS, the UN Office for Project Services (UNOPS), and MINURSO guidelines, as well as with direction from the Polisario Front.¹⁸ UNMAS has a gender strategy as part of its overall country strategy.¹⁹ UNMAS also reported that gender has been mainstreamed into Western Sahara's national mine action work plans and the SMACO 2019–23 mine action strategy.²⁰ During survey, efforts are made to consider the needs of men, women, girls, and boys to ensure more effective and efficient operations, despite

challenges presented by conducting survey activities targeting Bedouin populations.²¹

UNMAS reported there is equal access to employment for qualified women and men in survey and clearance teams in Western Sahara, east of the Berm, including for managerial level/supervisory positions. In 2023, there was one woman employed by SMACO and eleven (14%) by SafeLane Global (UNMAS's contractor), including eight in operational roles (14%) (see Table 3).²²

Table 3: Gender composition of SMACO and SafeLane Global²³

Entity	Total staff	Women staff	Total managerial or supervisory staff	Women in managerial or supervisory positions	Total operational staff	Women in operational positions
SMACO	5	1 (20%)	2	0 (0%)	0	0 (0%)
SafeLane Global	77	11 (14%)	17	2 (12%)	57	8 (14%)
Totals	82	12 (15%)	19	2 (11%)	57	8 (14%)

Through SMACO, UNMAS also supports the Sahrawi Mine Action Women's Team (SMAWT), an all-female organisation working on risk education in Rabouni and the five Sahrawi refugee camps. All national deminers, both male and female, are ethnic Sahrawi.²⁴

14 Emails from Elhadji Kebe, UNMAS, 16 May 2024; Leon Louw, UNMAS, 4 February 2022; Graeme Abernethy, UNMAS, 14 September 2018; Edwin Faigmane, UNMAS, 18 June 2020; and UNMAS, "2017 Portfolio of Mine Action Projects: MINURSO".

15 Questionnaire response by Gerhard Zank, HALO, 22 May 2017; and email, 17 May 2016.

16 Response to questionnaire by Sarah Holland, UNMAS, 24 February 2014, and email, 25 February 2014; and email from Edwin Faigmane, UNMAS, 6 August 2020.

17 Email from Elhadji Kebe, UNMAS, 16 May 2024.

18 Emails from Graeme Abernethy, UNMAS, 1 March and 5 May 2018.

19 Email from Leon Louw, UNMAS, 30 March 2021.

20 Email from Edwin Faigmane, UNMAS, 18 June 2020.

21 Emails from El Hadji Mamadou Kebe, NPA, 4 May 2019 and 14 March 2018.

22 Email from Elhadji Kebe, UNMAS, 16 May 2024.

23 Ibid.

24 Email from Leon Louw, UNMAS, 30 March 2021; and SMAWT newsletter, March 2022, at: <https://bit.ly/3yN542U>.

ENVIRONMENTAL POLICIES AND ACTION

There is no national standard on environmental management in mine action, but SMACO has a policy on environmental management that requires all implementation plans to consider environmental impacts.²⁵ UNMAS Western Sahara reported that environmental impact is considered as part of the tasking and subsequent implementation plan in order to minimise potential harm from demining.²⁶ This includes waste disposal procedures for rubbish, and grey and black water disposal; how and where to set up camps; and how to dismantle camps without leaving an operational footprint.²⁷

Risks from extreme weather such as high temperatures and sandstorms are factored into the planning and prioritisation of survey and clearance tasks. Operations are halted during sandstorms; during periods of extreme heat, teams start earlier and work shorter hours.²⁸

INFORMATION MANAGEMENT AND REPORTING

The Information Management System for Mine Action (IMSMA) database for Western Sahara, east of the Berm, was upgraded to IMSMA Core in 2022.²⁹ All data have been successfully migrated to the new database. Review and verification of the data, which began at the end of 2023, were ongoing at the time of writing.³⁰

PLANNING AND TASKING

In 2019, SMACO developed its strategy for mine action in Western Sahara, east of the Berm, covering 2019–23 (in line with the global UN Mine Action Strategy 2019–2023). In order to achieve a Western Sahara free of the impact of mines and ERW, SMACO has established the following timed objectives:

- to implement efficient and effective communication with national and international organisations by 2019
- to establish an effective mechanism for data collection of accidents and victims which will be shared with partners according to the SMACO Data Protection Policy by 2019
- to establish sustainable and constant funding of SMACO by 2020
- to ensure availability of human resources to comprehensively manage mine action by 2020
- to fully implement a professional management structure within SMACO by 2021
- to create a discussion platform (think tank) for a national victim rights protection policy by 2022
- to establish a national employment policy for mine action activities by 2023.³¹

In 2022, SMACO developed a form for accident and victim data collection in Western Sahara, east of the Berm and victims, following a series of workshops with stakeholders, which were then approved by the Sahrawi Ministry of Defence. The form is available in both Arabic and English.³² The other strategic objectives have still to be realised and UNMAS has recently reported that no new strategy was under development. There is, however, a plan for UNMAS to establish a standing capacity to support SMACO in developing a new strategy as soon as possible.³³ A mine action work plan was in place for UNMAS in 2023, developed by UNMAS Western Sahara, in support of MINURSO's mandate.³⁴

UNMAS and SMACO identify priorities for clearance of both minefields and cluster munition strikes east of the Berm in conjunction with MINURSO. Priorities are identified based on humanitarian needs for the safety and freedom of movement of local populations, while UNMAS Western Sahara facilitates the ceasefire and ensuring the safe passage of UN personnel.³⁵

STANDARDS AND LAND RELEASE EFFICIENCY

Local mine action standards were developed and finalised in 2016 by UNMAS together with SMACO, and in coordination with operational partners. UNMAS reported in 2019 that translation of the standards into Arabic had been completed and shared

25 Email from Edwin Faigmane, UNMAS, 18 June 2020.

26 Emails from Leon Louw, UNMAS, 4 February 2022; and Edwin Faigmane, UNMAS, 21 March 2022.

27 Email from Edwin Faigmane, UNMAS, 24 May 2022.

28 Email from Elhadji Kebe, UNMAS, 16 May 2024.

29 Emails from Leon Louw, UNMAS, 4 February 2022; and Nadine Hussein, UNMAS, 30 May 2023.

30 Email from Elhadji Kebe, UNMAS, 16 May 2024.

31 SMACO "Strategic Plan 2019–2023", at: <http://bit.ly/38jaGm2>; and email from Robert Thompson, UNMAS, 31 July 2019.

32 Email from Leon Louw, UNMAS, 4 February 2022.

33 Email from Elhadji Kebe, UNMAS, 16 May 2024.

34 Ibid.

35 Emails from Graeme Abernethy, UNMAS, 1 March and 5 May 2018; and Edwin Faigmane, UNMAS, 6 August 2020.

with SMACO.³⁶ UNMAS has claimed the standards are reviewed annually but that no updates were made in 2023.³⁷ An external quality management (QM) system was in place from 2018, implemented by UNMAS and SMACO east of the Berm.³⁸

OPERATORS AND OPERATIONAL TOOLS

SafeLane Global (formerly Dynasafe MineTech Limited) was the sole implementing operator for UNMAS Western Sahara in 2023.³⁹

Table 4: Operational clearance capacities deployed in 2023⁴⁰

Operator	Manual teams	Total deminers	Comments
SafeLane Global (for UNMAS Western Sahara)	2	24	Increase from one team of ten deminers in 2022
Totals	2	24	

LAND RELEASE OUTPUTS AND PROGRESS TOWARDS COMPLETION

LAND RELEASE OUTPUTS IN 2023

No survey of mined area was conducted in 2023 or 2022.⁴¹

A total of 78,316m² of mined area was released through clearance across three tasks with one ongoing at the end of the year. During clearance, one AP mine, two AV mines, and one item of UXO were found and destroyed.⁴² In 2022, no clearance took place.⁴³

Between 1 September 2022 and 31 August 2023, the RMA reported release of more than 165km² of land west of the berm with the destruction of 7 AP mines, 44 AV mines, and 770 items of ERW.⁴⁴

PROGRESS TOWARDS COMPLETION

The Sahrawi Arab Democratic Republic (SADR) is not a State Party to the APMB and cannot adhere as it is not recognised as a State by the depositary – the UN Secretary-General. In June 2014, however, the SADR submitted a voluntary Article 7 transparency report to the UN “as a sign of the support of the Sahrawi State for the goals of the Treaty”.⁴⁵

In SMACO's mine action strategy 2019–23, the vision is for Western Sahara to be free of the impact of mines and ERW by 2023.⁴⁶ No land release took place during 2021 or 2022 as operations were restricted by both COVID-19 and the resurgence of conflict. Western Sahara did not meet its 2023 completion date, which should now be revised along with the elaboration of a new strategic plan. However, UNMAS has stated that due to the current political and security situation, it is challenging to estimate a completion date for clearing mines and other explosive ordnance in Western Sahara.⁴⁷

UNMAS Western Sahara advocated for the resumption of demining east of the Berm, receiving approval from the RMA in August 2022 with the Polisario Front following suit in January 2023. In April 2023, demining teams were remobilised and retrained with teams deployed for battle area clearance (BAC) the following month for the first time since 2020.⁴⁸ In 2023, UNMAS personnel east of the Berm faced movement restrictions imposed by the Polisario Front/SMACO on four occasions.⁴⁹

Alongside demining activities, UNMAS teams are investigating all explosive ordnance incidents related to drone strikes east of the Berm and the firing of high-calibre ammunition west of the Berm. The results are documented and shared with MINURSO. These investigations are conducted jointly by the implementing partner and UN Military Observers and are recorded in the UNMAS database.⁵⁰

36 Emails from Robert Thompson, UNMAS, 29 April 2019; and Dandan Xu, UNMAS, 28 June 2019.

37 Email from Elhadji Kebe, UNMAS, 16 May 2024.

38 Emails from Robert Thompson, UNMAS, 29 April 2019; and Edwin Faigmane, UNMAS, 28 July 2020.

39 Email from Elhadji Kebe, UNMAS, 16 May 2024.

40 Email from Elhadji Kebe, UNMAS, 25 April 2023.

41 Emails from Elhadji Kebe, UNMAS, 16 May 2024 and 30 May 2023.

42 Email from Elhadji Kebe, UNMAS, 16 May 2024.

43 Email from Elhadji Kebe, UNMAS, 30 May 2023.

44 Report of the Secretary-General on the situation concerning Western Sahara, UN doc. S/2023/729, 3 October 2023, para. 53.

45 “SADR initiative welcomed by Maputo Conference on Mine Ban”, *Sahara Press Service*, 2 July 2014, at: <https://bit.ly/48y5hG0>.

46 SMACO “Strategic Plan 2019–2023”, at: <http://bit.ly/38jaGm2>.

47 Email from Elhadji Kebe, UNMAS, 16 May 2024.

48 Email from Elhadji Kebe, UNMAS, 30 May 2023.

49 Email from Elhadji Kebe, UNMAS, 16 May 2024.

50 Ibid.