

Israeli Air Force

Revision date: 28 August 2018
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Picture by Yuvalr

The Israeli Air Force can often be heard on a number of HF frequencies. They are using quite some frequencies and ALE IDs. This network only came to light in early 2000 due to the presence of ALE, the Israeli origins confirmed after Hebrew voice traffic heard from aircraft after ALE calls. Encrypted AMD messages are also used. The identifier BB1 appears on all channels and appears to act as central net control station.

Modes:

MIL-STD-188-141A 125bd 1650Hz / USB
Voice / USB

Frequencies (kHz):

3178 3823 3824 3865 4681 5123 5129 5163 5209 5269 5478 5531 5563 5581 6224 6265
6288 6295 6330 6487 6504 6533 6562 6581 6621 6631 6728 6736 6742 6748 6859 6864
6878 6921 6925 6933 6980 6992 7390 7392 7630 7651 7655 7712 7734 7757 7780 7848
7857 7898 7950 7957 7961 7965 7967 7976 8059 8063 8135 8234 8323 8341 8521 8526
8556 8622 8797 8805 8841 8845 8847 8858 8877 8917 8993 9057 9135 9137 9219 9227
9265 9297 10004 10216 10352 10614 10642 10900 11246 11349 12251 13367 13972 15808 15940
16202 16730 19602 19606 22850

Voice callsigns:

"AAA" uses the Hebrew callsign "Pikuach" in voice, which translates to "Supervisor" in English.
The aircraft use their IAF ### calls.

ALE idents:

046 102 220 227 255 263 267 271 428 436 619 642 651 656 667 (aircraft IDs)
AAA (Tel Aviv) ACW ADZ AHG AMM ANY ARC AVB
AA1 AA2 AA3 AA4 AA5 AA6 AA7 AA8 AA9
A00 A21 A31 A32 A50 A506 A509 A91
AB8
AS5
B19 B36 B72 B84
BAA
BB1 BB2 BB3 BB4 BB5 BB6 BB7 BB8 BBS
C02 C06 C12 C14 C17 C21 C29 C30 C34 C35 C36 C38 C44 C47 C48 C52 C54 C62 C63 C77 C79 C85
DAS
DD1 DD2 DD3 DD4 DD5 DD6 DD7 DD8 DD9
E03 E37 E69
GN2
HIL
IRY
K02 K20 K22 K27 K28 K35 K36 K45
KH1
M20 M46 M60 M64 M72 M75
MN1 MN4
NAK
P15 P22
R17 R27 R38 R46 R67
S07 S08 S10 S11 S15 S19 S22 S27 S30 S37 S45 S47 S48 S53
SAS
T03 T14 T22 T33 T35 T56 T59
TKM
TRY
TS1 TS2 TS3
TSB TSF TSM TSR
V87
W69 W71 W72 W75 W78 W90 W93
Y03 Y11 Y14 Y15 Y17 Y20 Y22 Y34 Y37 Y42 Y45 Y59 Y75 Y80 Y85 Y87
YN1 YN2
YNT
ZM6



Picture by Oren Rozen

Sample messages: Encrypted AMD data exchanges

TO][428][TWS][BB2][ALO] BER 30 SN 12
[[CMD AMD] 029YYP<4XGFXQX4_XQXGK^.XQX2G60XQX.R6ZR^XQX+R=0R^;X057]
[RX][CH 10][TO ?][TO ?]
[AMD 078RR;N&>045][TIS 428][E]

TO][?][TIS][428][ALO] BER 30 SN 09
[RX][CH 10][TO ?][TO ?]
[AMD 06833&QK?159][TIS BB1][E]

TO][?][TIS][BB1][ALO] BER 28 SN 10
[RX][CH 10][TO ?][TO ?][FRM BB1]
[AMD 182]]DK\$=+BL\$8\$GB%,3+"V\$8\$=BR3=&+"\$8\$ PRBL\$8\$%+"&B=\$8\$4B4B6\$070][TIS BB1][E]

TO][?][TIS][BB1][ALO] BER 28 SN 10
[CMD AMD] 133\$X T*5O/R*N*6/7L'OC:*N*5/H'5^OC*N*T>H/R*N*7OC^/5*N*_/_/&*00HI0]
[RX][CH 10][TIS BB1][E]

Example 2: Encrypted AMD data exchanges between two C130 aircraft

[RX][CH 16][TO ?][TO ?][FRM 435]
[AMD 081XX]]O<_H&H6<9<HA66&<9<4;6^<9<EO<9LEON080][TIS 435][E]

[TO][?][TIS][435][ALO] BER 27 SN 14
[RX][CH 09][TO ?][TO ?][FRM BB2]
[AMD 003::B@%+(,=YM,+V+43Y8%(W+V+&"+V+AA,=MA+VVVVVVV::J/088][TIS BB2][E]

[TO][?][TIS][BB2][ALO] BER 30 SN 20
[[CMD AMD] 006XX,X;--V-'V,BXC,I"Z3,-33XI\X#X"3(3X,03',I"#B"CCBI-0154]
[RX][CH 16][TO ?][TO ?][FRM 435]
[AMD 006XX,X;--V-'V,BXC,I"Z3,-33XI\X#X"3(3X,03',I"#B"CCBI-0154][TIS 435][E]

[TO][?][TIS][435][ALO] BER 29 SN 16
[[CMD AMD] 135))ZM2@FA2+\$@L@2^AJ0@L@%#0@L@O/@L@F\$GU@L@O2@L@G^CJ@L@0#\$U@043]
[RX][CH 08][TO ?][FRM 435]
[AMD 135))ZM2@FA2+\$@L@2^AJ0@L@%#0@L@O/@L@F\$GU@L@O2@L@G^CJ@L@0#\$U@043]
[TIS 435][E]

Military Airfield:

Hatzerim	31°14'N 34°39'E	Palmachim	31°53'52.00"N 34°41'26.00"E
Hatzor	31°45'N 34°43'E	Ramat David	32°39'N 35°10'E
Ben Gurion	32°00'N 34°53'E	Ramon	30°46'N 34°40'E
Megiddo	32°35'N 35°13'E	Sdot Micha	31°42'N 34°55'E
Nevatim	31°12'N 35°00'E	Sde Dov	32°06'N 34°46'E
Ovda	29°56'N 34°56'E	Tel Nof	31°50'N 34°49'E

Squadrons:

Combat Squadrons

69 Squadron
101 Squadron
105 Squadron
106 Squadron
107 Squadron
109 Squadron
110 Squadron
116 Squadron
117 Squadron
119 Squadron
133 Squadron
201 Squadron
253 Squadron

Helicopter Squadrons

113 Squadron
114 Squadron
118 Squadron
123 Squadron
124 Squadron
190 Squadron
193 Squadron

Airbase

Hatzerim Airbase
Hatzor Airbase
Hatzor Airbase
Tel-Nof Airbase
Hatzerim Airbase
Ramat David Airbase
Ramat David Airbase
Nevatim Airbase
Ramat David Airbase
Ramon Airbase
Tel-Nof Airbase
Ramon Airbase
Ramon Airbase

Airbase

Ramon Airbase
Tel-Nof Airbase
Tel-Nof Airbase
Hatzerim Airbase
Palmachim Airbase
Ramon Airbase
Ramat David Airbase

Special Squadrons

161 Squadron
166 Squadron
200 Squadron
210 Squadron
102 Squadron
115 Squadron
601 Squadron
249 Squadron

Command & Transport Squadrons

100 Squadron
103 Squadron
120 Squadron
122 Squadron
131 Squadron
135 Squadron

Airbase

Palmachim Airbase
Palmachim Airbase
Palmachim Airbase
Tel Nof Airbase
Hatzerim Airbase
Ovda Airport
Tel Nof Airbase
Sde Dov Airport

Airbase

Sde Dov Airport
Nevatim Airbase
Nevatim Airbase
Nevatim Airbase
Nevatim Airbase
Sde Dov Airport

Sources / related websites:

Israeli Air Force <http://www.idfblog.com/blog/category/inside-the-idf/idf-units/air-force/>
<http://www.idf.il/1513-en/Dover.aspx>
Wikipedia http://en.wikipedia.org/wiki/Israeli_Air_Force
UDXF <http://www.udxf.nl/>
UMC Utility Monitoring Central archive
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