

**Virtual SALT LAKE CITY (vZLC) AIR ROUTE TRAFFIC CONTROL CENTER (ARTCC)
AND Virtual SEATTLE (vZSE) ARTCC
LETTER OF AGREEMENT**

EFFECTIVE: 15DEC2020

SUBJECT: Interfacility Coordination Procedures

PURPOSE: To establish standard procedures for the coordination/control of air traffic between vZLC and vZSE.

SCOPE: The procedures outlined herein establish interfacility coordination procedures between vZLC and vZSE.

CANCELLATION: This agreement cancels any previous agreement between vZLC and vZSE

DEFINITIONS:

- TCP = Transfer of Control Point. Unless otherwise indicated, the TCP will be the ARTCC Boundary.
- vZLC or ZLC = Virtual Salt Lake City Air Route Traffic Control Center (*ARTCC*).
- vZSE or ZSE = Virtual Seattle Air Route Traffic Control Center (*ARTCC*).
- SLC_CTR = Any ZLC Center Position providing services for associated ZLC sectors.
- SEA_CTR = Any ZSE Center Position providing services for associated ZSE sectors.
- GEG_APP = Any Spokane Air Traffic Control Tower/Approach Control Position providing approach/departure services for MSO airport (*SEA_CTR when GEG_APP is not online*).

GENERAL PROCEDURES:

- a. Each ARTCC must keep the other advised of any changes including weather, traffic, or equipment that may limit or adversely affect air traffic control or facility operation.
- b. Each ARTCC must advise the other whenever any adjacent sector is open or combined, specifying the stratification and frequency to be assigned.
- c. Interfacility coordination of departing aircraft must be affected with the first sector in the receiving facility's airspace that the aircraft will enter. Subsequent coordination and

handoff must be accomplished by the receiving facility.

d. Either Center may at its discretion provide direct routing to RNAV/GPS equipped aircraft with destinations in the receiving Center's airspace, but no farther than a transition point on a published STAR.

e. Interim Altitude Procedures:

- i. Interim altitude use is authorized between facilities.
- ii. Use of an interim altitude must be considered valid coordination.
- iii. Acceptance of a handoff constitutes authorization to climb/descend to the displayed altitude.

f. ZSE to ZLC Routing:

| DESTINATION | RNAV ROUTE | NON-RNAV ROUTE | ALTITUDE |
|-------------|--|---|----------|
| KBOI | HOSTS.PARMO (STAR) <i>or</i> DEVLE.KYANN (STAR) <i>or</i> SUMOQ/COLLR.BEWTE (STAR) | Direct or on an airway to the BOI VORTAC | n/a |
| KSLC | BYI/PIH.SKEES (STAR) <i>or</i> BVL.WAATS (STAR) | BYI/PIH.BEARR (STAR) <i>or</i> BVL.BVL (STAR) | n/a |

g. ZLC to ZSE Routing:

| DESTINATION | DEPARTURE AREA | ROUTE | ALTITUDE |
|-------------|----------------|--|------------------------------|
| SEA/BFI/RNT | ZLC 19/20 | GLASR (STAR) | n/a |
| SEA/BFI/RNT | KSLC/ZLC 30/41 | PDT.CHINS (STAR) | n/a |
| KGEG | All | HILIE (STAR) | At or below FL280 at the TCP |
| KPDX | All | HHOOD (STAR) Or IMB LTJ V520 BTG | n/a |

- i. Aircraft must be cleared direct no further west on their respective arrivals than TEMPL, SKYKO, or SUNED.

h. Transfer of Control. Upon the transfer of radar identification and communication:

- i. ZLC and ZSE will have control for turns up to 15 degrees within 30 miles of the common boundary. The receiving controller is responsible for point-outs when a turn will affect another sector.
- ii. ZLC 19 will have control for turns up to 30 degrees for aircraft landing GPI within 30 miles of the common boundary. The receiving controller is responsible for point-outs when a turn will affect another sector.
- iii. ZLC and ZSE will have control for descent of aircraft landing at the following airports:
 1. GPI arrivals assigned FL230 or below;
 2. PSC/LWS/RDM/BDN arrivals from ZLC 41 (or 41/30 when combined);
 3. BKE arrivals assigned FL230 or below from ZSE 47/10/18;
 4. LGD arrivals assigned FL230 or below from ZLC 30/31;
 5. BNO arrivals from ZSE 5;

6. MYL arrivals from ZSE 47/18;
7. BOI arrivals from ZSE 18/47/10.

The receiving controller is responsible for point-outs when a descent will affect another sector.

- iv. ZLC and ZSE ARTCC will have control for code changes.
- i. Sector stratification.
 - i. Commonly combined:
 1. ZSE: S04 - 124.2
 2. ZLC: C33 - 120.27
 - ii. During real-world sector split operations, the following will be recognized:
 1. ZSE ARTCC sectors are stratified at FL230 and below for low sectors, and FL240 and above for high sectors.
 - SEA_04_CTR on 124.200 (2-way e/w split; as depicted in attachment #7)
 - SEA_47_CTR on 118.550 (2-way e/w split; as depicted in attachment #7)
 - SEA_18_CTR on 126.100 (5-way split; as depicted in attachment #6)
 - SEA_10_CTR on 127.600 (5-way split; as depicted in attachment #6)
 - SEA_30_CTR on 135.150 (5-way split; as depicted in attachment #6)
 - SEA_04_CTR on 124.200 (5-way split; as depicted in attachment #6)
 - SEA_47_CTR on 118.550 (5-way split; as depicted in attachment #6)
 2. ZLC ARTCC sectors extend upward from the surface except as follows:
 - Sector 19
 - ALTITUDE STRATUM: Surface to but not including FL290.
 - LATERAL: Reference Attachment # 2

- Sector 20
 - ALTITUDE STRATUM: FL290 and above.
 - LATERAL: Reference Attachment # 2

- Sector 06
 - ALTITUDE STRATUM: SFC and above.
 - LATERAL: Reference Attachment # 3

- Sector 30
 - ALTITUDE STRATUM: Surface to but not including FL290.
 - LATERAL: Reference Attachment # 4

- Sector 41
 - ALTITUDE STRATUM: FL290 and above
 - LATERAL: Reference Attachment # 4

- Sector 43
 - ALTITUDE STRATUM: Surface to but not including FL360.
 - LATERAL: Reference Attachment # 5

- Sector 42
 - ALTITUDE STRATUM: FL360 and above.
 - LATERAL: Reference Attachment # 5

SPOKANE / MSO ATCT PROCEDURES

- a. Each ARTCC (*ZLC/ZSE*) must post a NOTAM to pilots on each of the ARTCC websites explaining the MSO/GEG_APP delegation process to pilots.
PRESENTATION LINK

- b. While GEG_APP (*or SEA_CTR in the absence of GEG_APP*) is online, that controller will be delegated the airspace from ZLC within the lateral confines depicted in Attachment 1 from the surface up to and including 14,000 feet MSL. Otherwise, ZLC will provide Approach/Departure services for MSO within the Delegated airspace.

- c. ZLC provides Local Control TOP-DOWN (*TWR/GND*) services to MSO airport all times. When SLC_CTR or MSO_TWR/GND is not online, ZSE must treat MSO airport as a non-towered field and provide approach/departure services as appropriate.
Note-When GEG_APP or SEA_CTR is online and MSO_TWR is not, the departure for that airport must be treated as a non-towered departure.

d. Arrival Procedures:

- i. The clearance limit must be the destination airport for arriving aircraft. All aircraft must be:
 1. Direct to MSO airport
 2. On an airway to the MSO VOR
 3. On the MLP transition for the ILS approach runway 11
- ii. A radar handoff and communications transfer within 40nm of MSO constitutes transfer of control for descent and turns of 45 degrees either side of the assigned route or heading.
- iii. ARTCC must descend aircraft to be level at or descending to 15,000 feet MSL prior to handing off to GEG_APP.
- iv. GEG_APP must descend aircraft arriving from ZSE airspace to cross 2.5nm prior to the ZSE/ZLC common boundary at or below 14,000 feet MSL. GEG_APP must affect a Pointout with ZLC if it is determined that the aircraft will not meet this crossing restriction.

e. Departure Procedures:

- i. GEG_APP must ensure that departures are established on a route or vector to join their filed route before leaving the lateral boundary of GEG_APP's delegated airspace.
- ii. All aircraft must be cleared to 14,000 feet MSL, or requested altitude if lower. Aircraft requesting 15,000 feet MSL or above must be advised to expect requested altitude 5 minutes after departure.
- iii. Aircraft filed at or below 13,000 feet MSL that are assigned routes between the MSO 097R clockwise to MSO 150R must be established on V86 to CPN VOR and then direct to the first fix on their flight plan.
- iv. GEG_APP must coordinate the airspace release with ZLC Sector 19 when shutdown/resumption of service takes place.
Note-This coordination must take place within 10min after SEA_CTR or GEG_APP opening without prompting.

Examples:

GEG_APP: "Salt Lake 19, Spokane. Assumption Request"

ZLC: "19"

GEG_APP: "Request assumption of Missoula delegated airspace"

ZLC: "(any pertinent info), Missoula airspace released as requested, KC."

GEG_APP: "Missoula airspace my control, AB"

GEG_APP: "Salt Lake 19, Spokane. Closing Release."

ZLC: "19"

GEG_APP: "(any pertinent info), Missoula delegated airspace released."

ZLC: "Missoula airspace my control, KC."

GEG_APP: "AB"

- v. In order to simulate Flight Data Input/Output (*FDIO*) configuration operations, ZSE controllers providing approach and departure control services to MSO must configure their radar client to be notified of flight plan information concerning arrivals and departures for MSO airport.
 1. SEA_CTR and/or GEG_APP must configure the radar client visibility to receive flight data of aircraft 80nm east of MSO VOR and filters set to display aircraft from the Surface up to and including 15,200 feet MSL.
 2. In order to resolve a common technical glitch in the VATSIM radar client software, when GEG_APP is online that controller must set a visibility point at "KMSO" so that GEG_APP and MSO_TWR radar clients recognize each other. MSO_TWR/GND will do the same for KGEG.

ATTACHMENTS:

- Attachment 1: GEG_APP Delegated Airspace Depiction and Handoff Points.
- Attachment 2: ZLC Sectors 19 & 20
- Attachment 3: ZLC Sector 06
- Attachment 4: ZLC Sectors 30 & 41
- Attachment 5: ZLC Sectors 42 & 43
- Attachment 6: ZSE Sectors 04, 18, 47, 10, & 30
- Attachment 7: ZSE Sectors E/W Splits

SIGNATURES:

/s/

Paul Biderman
Air Traffic Manager
Virtual Salt Lake City Air Route Traffic Control Center

/s/

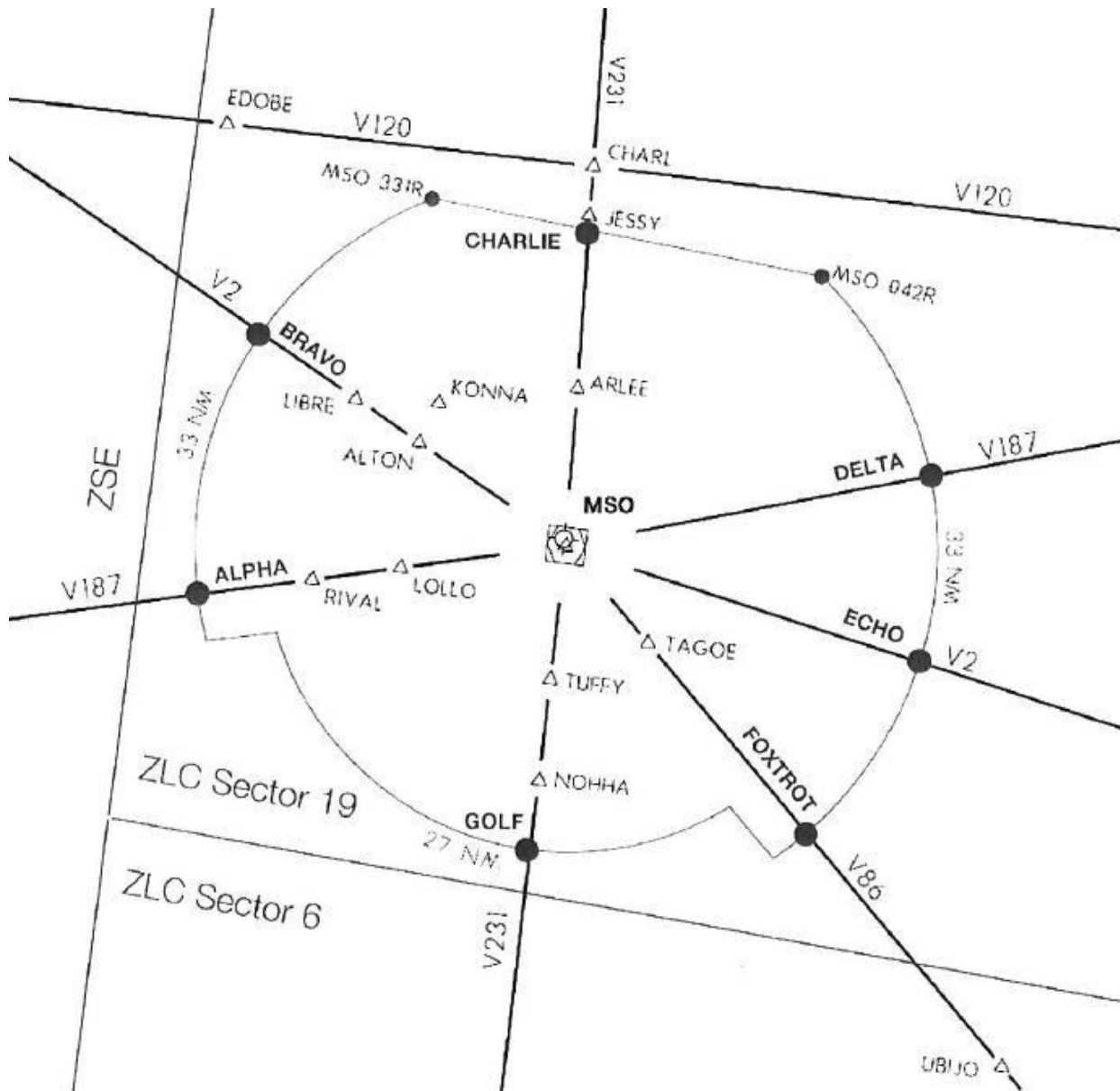
Matthew Woerly
Air Traffic Manager
Virtual Seattle Air Route Traffic Control Center

/s/

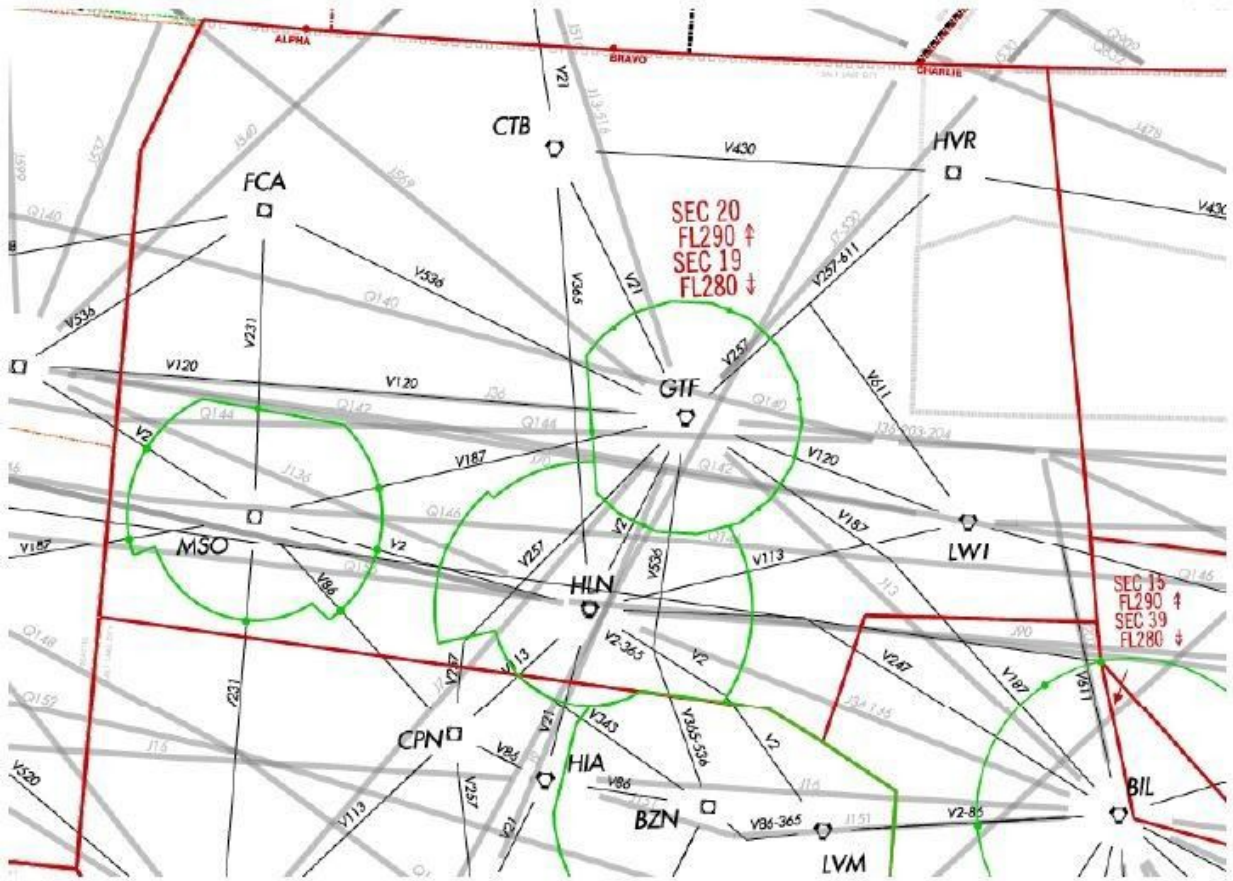
Ryan Parry
VATUSA4

Attachment 1:

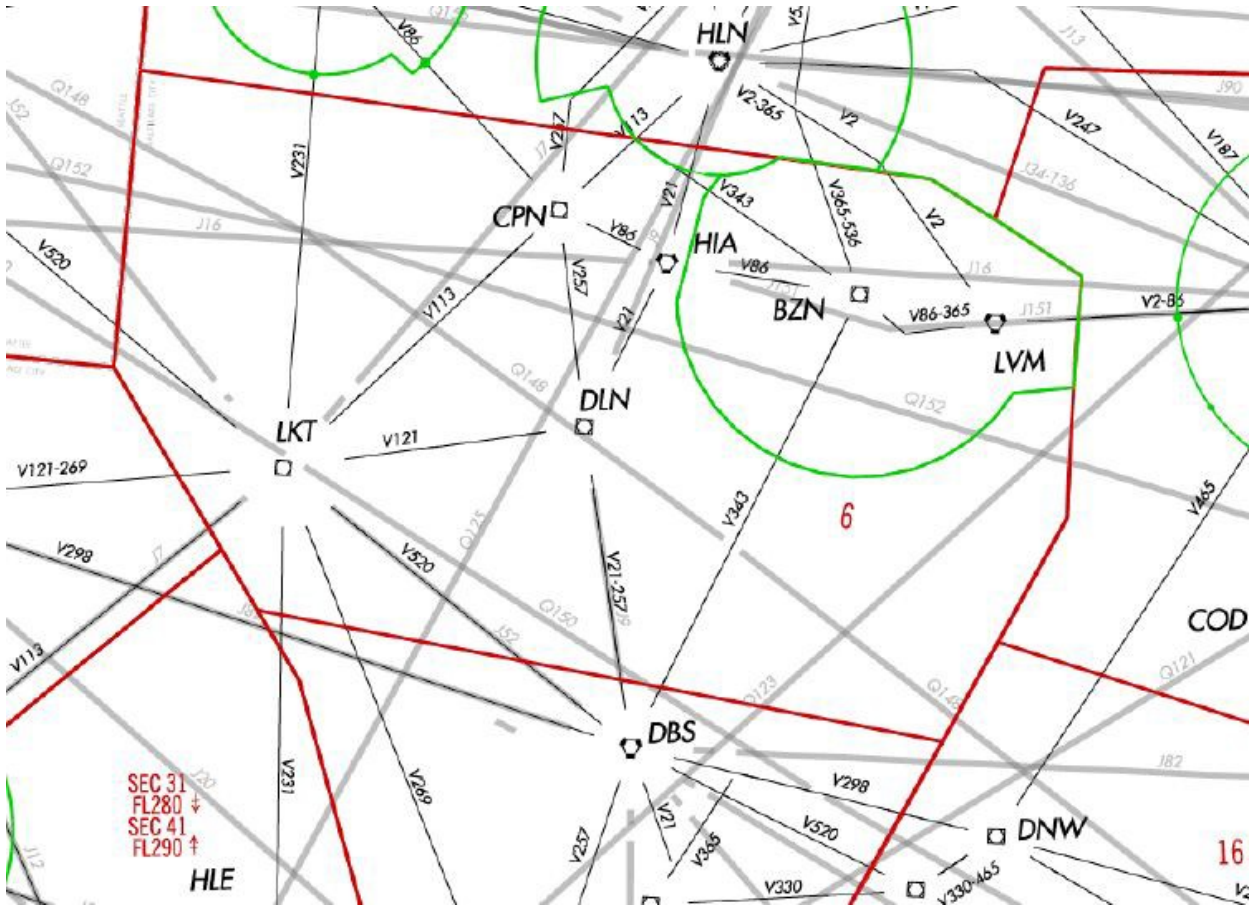
Spokane Approach (GEG_APP) Delegated Airspace Depiction and Handoff Points.



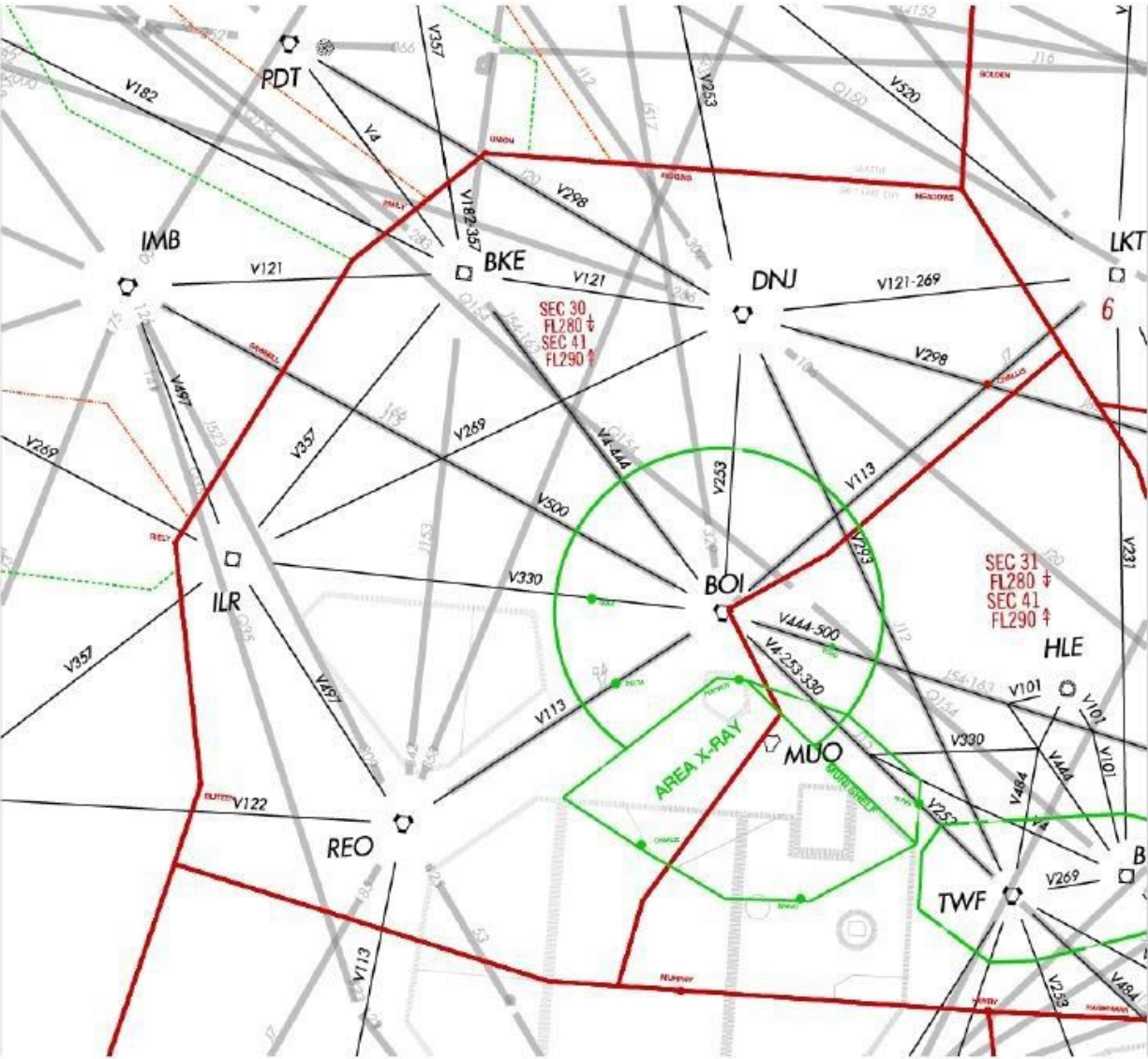
Attachment 2:
ZLC Sectors 19 & 20



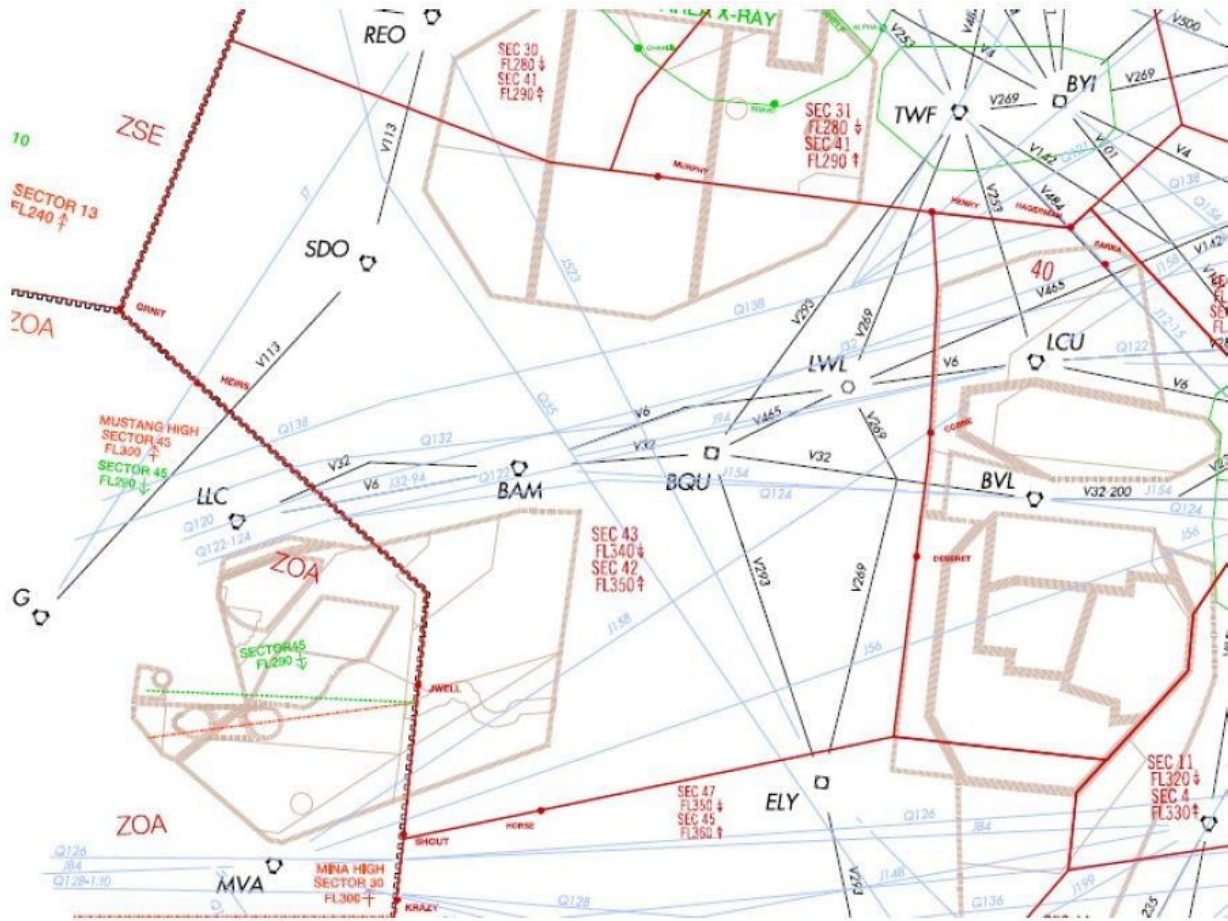
**Attachment 3:
ZLC Sector 06**



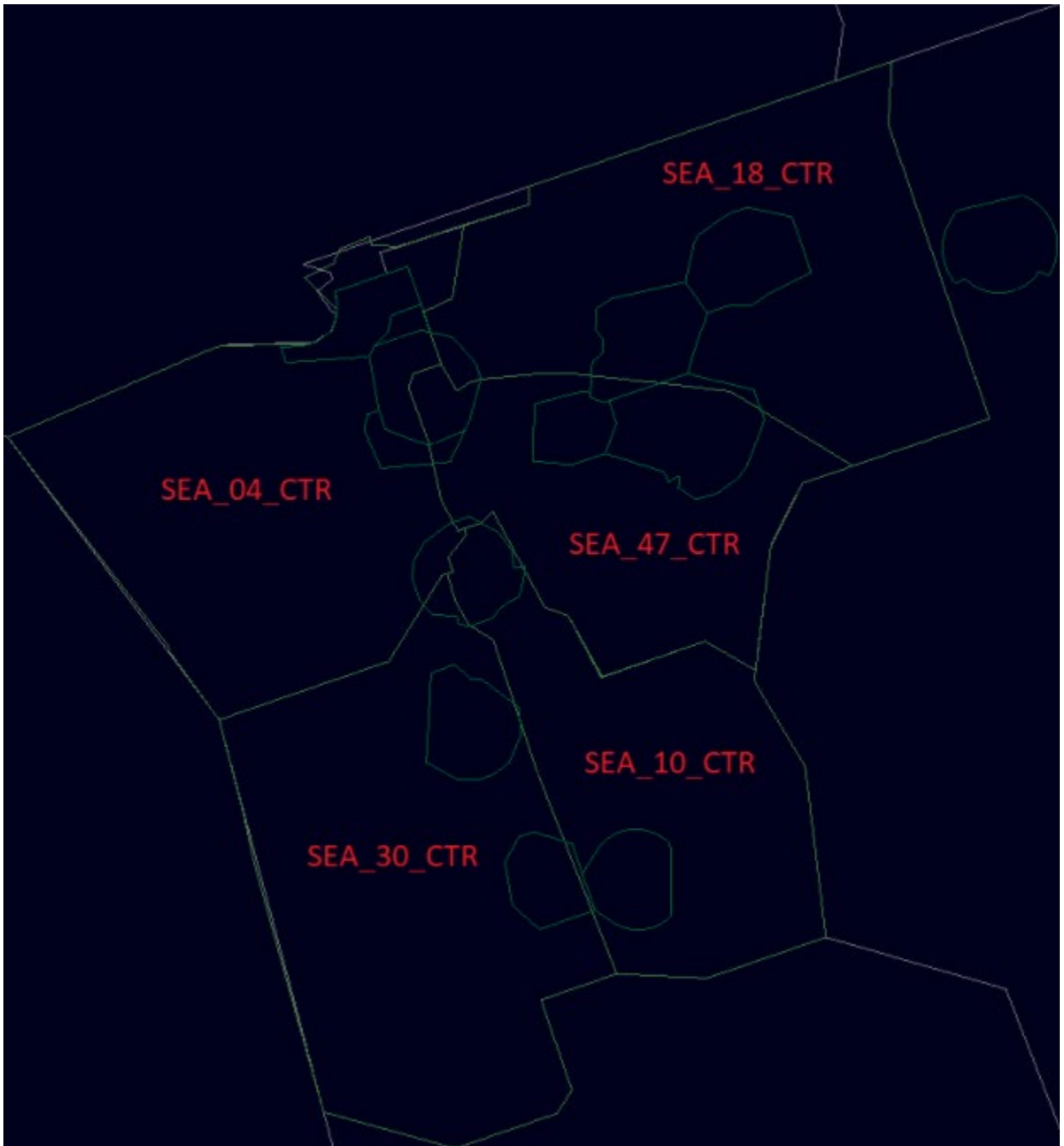
Attachment 4:
ZLC Sectors 30 & 41



Attachment 5: ZLC Sectors 42 & 43



Attachment 6:
ZSE 5-way Sector Split



Attachment 7:
ZSE E/W Sector Split

