

RESPONSES RECEIVED ON DRAFT REPORT 'FATAL ACCIDENT DYN'AÉRO MCR01'

The fourth and fifth columns provide the literal text of the responses of the parties. The last column contains an explanation from the Dutch Safety Board of the way the responses were processed.

No.	Organisation	Section	Text to be corrected (first ... last word)	Argumentation	Adopted	Dutch Safety Board response
1	LVNL	2.1	Altitude around 7000 ft.	Een altitude van 7000 ft boven TA wordt altijd in Flight Levels uitgedrukt. Hier zal FL70 bedoeld zijn, tenzij wordt betwijfeld of de juiste standaard QNH werd ingesteld. Translation Dutch Safety Board: An altitude of 7,000 ft above TA is always expressed in Flight Levels. FL70 was probably meant here, unless it is unsure whether the correct standard QNH had been set.	Yes	The text and figures have been amended in line with the comment.
2	LVNL	2.1	"The supervisor ... response" Suggestie: "several calls using the standard emergency frequency ... any"	De uitzendingen vonden plaats op de 121,500 MHz en daarnaast heeft de APP SUP ook gevraagd of de vlucht werkzaam was bij DutchMil, wat niet het geval was. Ook Dutchmil heeft geprobeerd om alsnog in contact te komen met de vlieger. Translation Dutch Safety Board: The transmissions took place on 121,500 MHz and in addition, the APP SUP also enquired whether the flight was active on Dutch Mil frequency, which was not the case. Dutch Mil also later tried contacting the pilot.	Yes	The text has been amended in line with the comment.
3	NSIA	2.1	Is it correct that FL07 was equal to 7000 feet at the day?	Fig 1 shows the aircraft entering Schipol TMA at FL07 and Fig 2 shows the aircraft entering Schipol TMA at 7000 feet.	Yes	QNH was 1012 mbar. This means the aircraft entered the Schiphol TMA 1 at approximately 7,000 feet.
4	LVNL	2.1	"The police ... aircraft" Suggestie: ... was unable to catch up with the aircraft and encountered poor visibility conditions.	Dit wordt immers ook uitgelegd op pagina 18. Translation Dutch Safety Board: This is, after all, also explained on page 18.	Yes	The text has been amended in line with the comment.
5	IenW	2.5	The maintenance records for the aircraft stored on board were not recovered and therefore not available for examination.	The report states only the maintenance records that were stored on board but is unclear if there were maintenance records found elsewhere, for instance at the house of the owner.	Yes	This has been clarified in the text.
6	LVNL	2.6.2	The recording ... with light rain.	De omstandigheden op de video stills lijken 'marginal' VMC. In zulke weersomstandigheden kan het zicht heel snel tot 'below VMC' verminderen als men in dichtere bewolking terecht komt. Translation Dutch Safety Board: The circumstances on the video stills appear to be marginal VMC. In such weather conditions, visibility can very quickly drop to below VMC when flying through thick cloud cover.	No	The comment is noted. No definition of 'marginal VMC' exists. In addition, the images in the report taken from the video recording have to be interpreted with care, as the video recording and the images may look worse than the actual situation, for example as a result of the camera quality, settings and light conditions. What could be concluded from the recording was that ground/water are in sight and there is a discernible horizon.

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7	NSIA	2.8	It is stated that no parts of the flapron system were recovered while on page 12 line 34 it is stated "Apart from the flaps, no parts of the flaperon system were recovered".	The section in page 19 from line 3 to line 10 specifies a separate investigation that was the source of the AD. On line 10 and 11 I assume you are talking about the accident with EC-ZAF although it could be clearer. I only information leading me to the conclusion is that it is difficult to make ad AD for a flapron system if the flapron system is not found.	Yes	The aircraft registration EC-ZAF has been included in the text to clarify that this sentence is about the accident aircraft.
8	NSIA	2.8	It could be made clearer that this sections is relating to EC-ZAF and not the accident described in lines 13-18.		Yes	The aircraft registration EC-ZAF has been added in the text.
9	LVNL	2.9.2	<p>Onlangs is aan de Quick Reference Handbooks (QRH's) het volgende toegevoegd: "De VKL/ VLA (dit geldt specifiek voor BK, GG, LE en RD) of FISO informeert (direct zelf of via de ACC-SUP) de kustwacht als de vkl door de omstandigheden of het vluchtverloop veronderstelt dat het vliegtuig in de kleine luchtvaart in ernstige problemen verkeert, ook al heeft de vlieger (nog) geen melding gemaakt van een noodsituatie."</p> <p>Translation Dutch Safety Board The following information has recently been added to the Quick Reference Handbooks (QRHs): "The Air Traffic Controller (VKL)/Air Traffic Control Assistant (VLA) (this applies specifically to BK, GG, LE and RD) or Flight Information Service Officer (FISO) will inform (either directly or via the ACC SUP) the Coastguard if the VKL assumes, due to the circumstances or flight path, that the general aviation aircraft is in serious trouble, even if the pilot has not or not yet reported an emergency situation."</p>	<p>Dit dossier was opgestart op basis van een brief van de kustwacht en n.a.v. het OVV rapport (Vliegtuig vermist, Cessna ongeval op Tweede Maasvlakte). De kustwacht is verantwoordelijk voor SAR binnen een SRR (Search & Rescue Region), zowel boven het water als op het land. De SRR betreft het EHAA FIR. In de huidige situatie is geconstateerd dat de menselijke interpretatie van een emergency (dus ook een situatie die nog geen emergency is, maar die kan uitgroeien tot een emergency) kan variëren en dat niet alle informatie over een 'state of emergency of an aircraft' altijd via (FIC of) de ACC-SUP met de kustwacht wordt gedeeld. In het OVV rapport wordt gesteld te onderzoeken waar de samenwerking met de kustwacht verbeterd kan worden. Dit is met het dossier onderzocht en de nodige invulling in de documentatie en training is hier aan gegeven.</p> <p>Translation Dutch Safety Board: This file was started after a letter from the Coastguard and in response to the Dutch Safety Board report (Aircraft missing, Cessna accident at Maasvlakte 2). The Coastguard is responsible for Search and Rescue (SAR) within an SRR (Search & Rescue Region), both above the water and on land. The SRR pertains to the EHAA Flight Information Region (FIR). In the current situation, it has been observed that the human interpretation of an emergency (including a situation that is not yet an emergency, but could develop into one) can vary and that not all the information about a 'state of emergency of an aircraft' is always shared with the Coastguard via the (Flight Information Centre (FIC) or) ACC SUP. A proposal mentioned in the Dutch Safety Board report was that an investigation should be carried out into how the cooperation with the Coastguard could be improved. This was investigated in the case and resulted in the substantial adaptation of the documentation and training.</p>	Yes	The information under Section 2.11 safety actions has been updated accordingly.
10	LVNL	2.9.3	At that stage, the identity and intentions of the aircraft were unknown to LVNL. Suggestie: At that stage, the identity and intentions of the aircraft were not known by the LVNL operational staff located at Schiphol Airport.	<p>Eelde TWR had wel radiocontact met het toestel en wist dus van de identiteit; daarbij is het overigens te betwijfelen of Eelde-TWR de FISO behulpzaam zou kunnen zijn: de FISO kon immers geen registratie opgeven om bij Eelde-TWR verder navraag te doen.</p> <p>Translation Dutch Safety Board: Eelde TWR did have radio contact with the aircraft and was therefore aware of its identity; despite this, it is doubtful whether Eelde TWR could have been of assistance to the FISO: after all, the FISO was unable to provide a registration to make further enquiries at Eelde TWR.</p>	Yes	The text has been amended in line with the comment.

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11	LVNL	2.9.3	"Approximately...actions."	Gezien de locatie waar de laatste positie van de track is waargenomen, belt de FISO eerst met de Pistoohaven (zoals ook in tabel 3 staat) om te informeren of de vlucht daar is geland, wat niet het geval is. Daarop informeert de FISO de ACC Supervisor, ongeveer 10 minuten na het verdwijnen van de track op radar. Translation Dutch Safety Board: Given the location of the last position where the track was detected, the FISO first called Pistoohaven harbour (as also shown in Table 3) to enquire whether the flight had landed there, which was not the case. The FISO then informed the ACC Supervisor, about ten minutes after the radar track disappeared.	Yes	The text has been amended in line with the comment.
12	LVNL	2.9.3	"Approximately ... actions" Suggestie: 'Approximately 10 minutes after the aircraft's radar ...'	De periode van ca 10 minuten is in het LVNL-onderzoek vastgesteld n.a.v. gesprekken met de betrokken FISO en Supervisor. Translation Dutch Safety Board: The period of approximately ten minutes was established in the LVNL investigation after discussions with the FISO and Supervisor involved.	Yes	The text has been amended in line with the comment.
13	LVNL	2.9.3	19:07 'LVNL FIC' svp veranderen in 'LVNL – FMCP' 19:16 'LVNL FIC' svp veranderen in 'LVNL – FMCP' 19:17 'LVNL FIC' svp veranderen in 'LVNL – FMCP' 19:29 'LVNL FIC' svp veranderen in 'LVNL – FMCP'	De FMCP is de assistent van de supervisor ten aanzien van de FIC taken. Translation Dutch Safety Board: The FMCP is the assistant to the supervisor for FIC tasks.	Yes	The text has been amended in line with the comment.
14	LVNL	2.10	Pilots flying.. (Amsterdam Information).	Suggestie: Start de zin met: "At the time of the incident.." Sinds 13 juli 2023 is de uitlusterplicht onder SPL TMA 1 ingevoerd. Translation Dutch Safety Board: Suggestion: Start the sentence with: "At the time of the incident.." A frequency monitoring obligation has been set under the Schiphol Terminal Manoeuvring Area (TMA) 1 as of 13 July 2023.	Yes	The text has been amended in line with the comment.
15	LVNL	2.11	"In .. supervisor"	Zie eerdere opmerking, deze wijziging is per 10-08-23 opgenomen in alle QRH's. De vereiste training is via een Trainings Bulletin bekend gesteld aan het OPS-personeel. Translation Dutch Safety Board: See previous comment, this change was incorporated into all QRHs as of 10-08-23. A Training Bulletin has informed the OPS staff of the required training.	Yes	The text has been amended in line with the comment.
16	LVNL	3.1.1	'with an altitude established at 800ft'	Het woordgebruik 'established' leest meestal als: 'het vliegtuig houdt deze hoogte vast' terwijl het kennelijk gaat om een single radar return. Dan is wellicht beter om 'determined' of een ander woord gebruiken om aan te duiden dat de radar het vliegtuig (kort) op die hoogte 'gezien' heeft. Translation Dutch Safety Board: The use of the word 'established' usually means: "the aircraft is maintaining this altitude" while it is apparently a single radar return. It may then be better to use 'determined' or some other word to indicate that the radar 'saw' the aircraft (briefly) at that altitude.	Yes	The text has been amended in line with the comment.

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17	lenW	3.1.3	It is considered unlikely that the pilot during the last part of the flight experienced spatial disorientation due to loss of visual reference.	Too speculative. Similarly one can argue that under the prevailing weather conditions it is considered likely the pilot experienced disorientation due to loss of visual reference considering his limited instrument flying capabilities. He had a total amount of less than 6 hours instrument flying time some 10 years ago. Additionally, the images in the report of the video are indicating very marginal VMC conditions, estimated to be recorded 2-4 minutes before the accident. These images do not necessarily represent the last part of the flight.	Partly	As indicated in the report, an extensive analysis of the available weather information was performed to determine the actual weather conditions at the location and time of the accident using also meteorological satellite and radar data. Some explanatory text has been added.
18	LVNL	3.1.3	It is considered unlikely ... visual reference	Gezien de video stills en de waarneming van de politie helikopter is het heel goed denkbaar dat het weer de visual reference (al of niet tijdelijk) weggenomen heeft. De tekst: "It is considered unlikely that the pilot during the last part of the flight experienced spatial disorientation due to loss of visual reference." is daarmee te stellig. Translation Dutch Safety Board: Given the video stills and the observations of the police helicopter, it is conceivable that the weather caused loss of visual reference (possibly temporarily). The text: "It is considered unlikely that the pilot during the last part of the flight experienced spatial disorientation due to loss of visual reference." is too adamant.	Partly	As indicated in the report, an extensive analysis of the available weather information was performed to determine the actual weather conditions at the location and time of the accident using also meteorological satellite and radar data. Some explanatory text has been added.
19	LVNL	3.1.3	"Based ... reference" 'Suggestie: "Based on analysis of the actual weather data, it was determined that the weather deteriorated along the flight route of the aircraft in Dutch airspace. It seems plausible that the pilot decided to descent during his flight along the coastline in order to remain in VMC. The prevailing weather at the time and location some time before the accident was in general VMC with a discernible horizon and the surface in sight. It cannot be determined whether the weather conditions during the last part of the flight where such that the pilot experienced spatial disorientation due to loss of visual reference."	De tekst over het lokale weer klinkt niet heel plausibel, afgezet tegen de waarnemingen van de politiehelikopter, die toch wel redelijk in de nabijheid is geweest en het feit dat het toestel steeds lager is gaan vliegen. Ook gezien de video stills is het heel goed denkbaar dat het weer de visual reference (al of niet tijdelijk) weggenomen heeft. De tekst: "It is considered unlikely that the pilot during the last part of the flight experienced spatial disorientation due to loss of visual reference." is daarmee te stellig. Verder is het hierbij wel relevant wat de situatie is geweest bij het Calandkanaal, gezien vanuit de hulporganisaties. Wat hebben die ervaren? Het zou best kunnen dat kort voor de crash het toestel in slecht weer condities is gekomen. Het is passender om de conclusie hierover wat feitelijker te verwoorden. Zie voorstel links. Translation Dutch Safety Board: The text about the local weather does not sound very plausible, in light of the observations of the police helicopter, that came quite close to the aircraft, and the fact that the aircraft flew lower and lower. The video stills also show that it is conceivable that the weather caused loss of visual reference (possibly temporarily). The text: "It is considered unlikely that the pilot during the last part of the flight experienced spatial disorientation due to loss of visual reference." is too adamant. Furthermore, it is relevant what the situation was at the Caland Canal as seen from the perspective of the aid organizations. What did they experience? It is feasible that the aircraft entered bad weather shortly before the crash. It would be more appropriate to phrase the conclusion in more factual terms. See proposal (at left).	Partly	See also response to comment number 18. Because of the distance of the trajectory of the police helicopter from the accident site, this is not representative of the weather at the site, see also Section 3.1.3. The search and rescue operations only started more than 30 minutes after the accident. Also this is not representative of the weather at the time of the accident.
20	LVNL	3.2.1	"When ... Supervisor" Suggestie: 'When after approximately 10 minutes it was still ...'	Zie de eerdere opmerking over pagina 21. De periode van ca 10 minuten is in het LVNL-onderzoek vastgesteld n.a.v. gesprekken met de betrokken FISO en Supervisor. Translation Dutch Safety Board See the previous comment about page 21. The period of approximately ten minutes was established in the LVNL investigation after discussions with the FISO and Supervisor involved.	Yes	The text has been amended in line with the comment.
21	LVNL	3.2.1	When after 30 minutes... informed the ACC Supervisor. Suggestie: "The FISO informed the ACC-SUP well within 30 minutes"	Het door de FISO informeren van de ACC-SUP is eerder gebeurd dan na ongeveer 30 minuten. Volgens ons interview met de FISO is dit naar schatting binnen 10 minuten gebeurd. In Table 3: Overview communication (pag.22) staat deze actie ook eerder in de tijdlijn dan 30 minuten. Het woord "after" klopt dus niet. Translation Dutch Safety Board Notification of the ACC SUP by the FISO occurred sooner than after approximately 30 minutes. According to our interview with the FISO, this is estimated to have taken place within ten minutes. In Table 3: Overview communication (p. 22) also shows this action earlier in the timeline than 30 minutes. The word 'after' is therefore incorrect.	Yes	The text has been amended in line with the comment.

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22	LVNL	3.2.1	"The...slightly."	<p>De alerting service is vanzelfsprekend beperkt als er geen radiocontact is met de vlieger. Dat betekent niet dat er helemaal geen actie wordt ondernomen door LVNL als er sprake is van vermissing, maar dit zal veelal in een later stadium gebeuren en niet worden geïnitieerd door Amsterdam FIC.</p> <p>Bijvoorbeeld, als een vlucht 30 minuten ná de (R)ETA nog niet is geland op een groen veld, initieert de havendienst van het veld van aankomst de alarmeringsfase INCERFA. Hij informeert bij FSC naar de status van de vlucht. Als FSC de vluchtstatus niet kan achterhalen, informeert hij de ACC-SUP over de vermissing van de vlucht. Hierna zal de ACC-SUP volgens het alarmformulier Vermissing verdere acties ondernemen.</p> <p>Translation Dutch Safety Board: It is inevitable that the alerting service is limited if there is no radio contact with the pilot. However, this does not mean that no action is taken by LVNL if an aircraft is missing, but this will usually take place at a later stage and will not be initiated by Amsterdam FIC. If a flight has not landed on a green field 30 minutes after the (R)ETA, for instance, airport operations services of the field of arrival will initiate the INCERFA alert phase. They will enquire about the status of the flight at FSC. If FSC cannot ascertain the flight status, they will inform the ACC SUP that the flight is missing. The ACC SUP will then take further actions in accordance with the Missing flight Form.</p>	Yes	The comment is noted. Some explanatory text has been added to indicate other situations are possible as well.
23	LVNL	3.2.1	.."history of a flight.."	<p>Suggestie is om meer te specificeren dat het hier om een onbekende (VFR-)vlucht gaat. Van bv. IFR vluchten zijn gegevens zoals de route sneller bij de hand op de werkpositie. Tekstuele suggestie: "..history of an unknown flight.."</p> <p>Translation Dutch Safety Board: Suggestion is to specify in more detail that it concerns an unknown (VFR) flight. For IFR flights, for example, data such as the route are available more quickly at the working position. Suggestion for text: "..history of an unknown flight.."</p>	Yes	The text has been amended in line with the comment.
24	LVNL	3.2.1	"When Rotterdam Port Authority (RPA) called LVNL regarding the found wreckage parts, both parties agreed that RPA would contact JRCC. The ACC Supervisor did therefore not contact JRCC initially." Suggestie is om de laatste zin uit deze tekst weg te laten.	<p>Na de vondst van de wrakstukken was het logisch dat de ACC SUP de afspraak maakte dat RPA zelf de kustwacht zou inlichten, omdat RPA over de precieze locatie beschikte en LVNL niet. RPA heeft bovendien meer kennis over de lokale omstandigheden dan LVNL en zij hadden de locatie al vastgesteld.</p> <p>Translation Dutch Safety Board: After the wreckage was found, it made sense that the ACC SUP made arrangements that RPA would notify the Coastguard because RPA knew the exact location of the wreckage while LVNL did not. Moreover, RPA has more knowledge of local conditions than LVNL and they had already determined the location.</p>	No	There were still many uncertainties at that time. LVNL has a different task and responsibilities than the port authority. The regulations on alerting services are clear on the tasks and the need to notify the JRCC immediately.
25	LVNL	3.2.1	"JRCC ... initiated"	<p>Hier is onlangs binnen LVNL invulling aan gegeven.</p> <p>Translation Dutch Safety Board: Arrangements have recently been put in place for this at LVNL.</p>	Yes	The comment is noted. Section 2.11 has been updated.

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26	LVNL	3.2.1	<p>"At the time ...organisations."</p> <p>Suggestie: "The wreckage of the aircraft was already found at the moment the Rotterdam Port Authority contacted LVNL. Because the Rotterdam Port Authority initially did the coordination, it was agreed that the Rotterdam Port Authority would inform the Coastguard. LVNL subsequently provides in accordance with the procedures the Last Known Position, the flight plan, departure message and POB to the Coastguard."</p>	<p>Er wordt gesteld dat er ten tijde van het ongeval van EC-ZAF geen duidelijk inzicht bij LVNL bestond wanneer en voor welke situaties JRCC te informeren. Dit is niet correct. In de LVNL operatie zijn heldere procedures voor het informeren van JRCC. In dit geval was het wrak van het toestel al gevonden en werd ter plekke gecoördineerd door het Havenbedrijf Rotterdam en later door de Brandweer Rotterdam. Omdat het havenbedrijf aanvankelijk de coördinatie verzorgt, is in onderling overleg tussen LVNL en het Havenbedrijf besloten dat het Havenbedrijf de Kustwacht informeert.</p> <p>LVNL verstrekt daarna de Last Known Position, het vliegplan, departure bericht en POB volgens de procedures aan de Kustwacht.</p> <p>Translation Dutch Safety Board: At the time of the EC-ZAF accident, it was claimed that LVNL did not have a clear understanding of when and for what situations to inform the Joint Rescue Coordination Centre (JRCC). This is incorrect. LVNL has clear procedures for informing JRCC. In this case, the wreckage of the aircraft had already been found and matters were coordinated on site by the Port of Rotterdam Authority and later by Rotterdam Fire Brigade. Because the Port Authority initially led the coordination, it was mutually agreed by LVNL and the Port Authority that the Port Authority would inform the Coastguard. In line with the procedures, LVNL would then provide the Last Known Position, the flight plan, departure message and POB to the Coastguard.</p>	No	<p>LVNL has indicated that after the accident the procedures have been updated and a training bulletin has been published.</p> <p>Direct communication and contact between LVNL and JRCC is essential in order to be able to provide good support for the search and rescue operation.</p>
27	LVNL	3.2.2	<p>"The LKP tool enables timely and easy extraction... and support the JRCC in using this for search and rescue purposes."</p>	<p>De suggestie is onterecht dat LVNL onduidelijke informatie verschaft. Alle informatie is relevant en het formulier is duidelijk over welke informatie welke status heeft, zoals ook in het conceptrapport staat. In ogenschouw nemend dat het vermoeden was dat de vlucht op lage hoogte mogelijk nog enige tijd was doorgevlogen, was op dat moment helder dat de kustwacht het beste de informatie kon verwerken en gebruiken.</p> <p>Translation Dutch Safety Board: The suggestion that LVNL provided unclear information is unwarranted. All the information is relevant and the form is clear about the status of the information provided, as also stated in the draft report. Considering that it was supposed that the aircraft possibly continued its flight at low altitude for some time, it was clear at the time that the Coastguard was best equipped to process and use the information.</p>	No	<p>This is an analysis of the situation of the Dutch Safety Board. Sending data in a standardised format does not automatically ensure correct understanding of the data presented. In the report it is indicated that the LKP tool enables timely and easy extraction of data. The investigation also showed that the explanatory information in the e-mail on actual and extrapolated data points does not meet the objective of creating a better understanding of the data presented.</p>

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28	LVNL	3.2.2	"Based ... purposes"	<p>Er wordt gesteld dat er geen gemeenschappelijk kader en begrip is over de radar data die door LVNL aan JRCC wordt verstrekt en dat de systemen van LVNL en JRCC niet compatibel zijn.</p> <p>De last known position gegevens betreffen een weergave van de laatste radarwaarnemingen en radartracker extrapolaties van het betreffende toestel. Hierbij dient rekening te worden gehouden met het feit dat radarwaarneming op lage hoogtes beperkt is. Verder kan een toestel in nood kort voor een crash ongewone manoeuvres maken. Ook in die gevallen zijn er beperkingen aan de radarwaarneming. De gegevens geven geen uitsluitel over waar een toestel is gecrasht, maar zijn een indicatie van waar het toestel voor het laatst is waargenomen als een van de inputbronnen voor het bepalen van een zoekgebied.</p> <p>De door LVNL verstrekte last known position gegevens zijn in een gestandaardiseerd formaat van lengte- en breedtegraden vermeld. LVNL begrijpt daarom de opmerking niet dat er geen gemeenschappelijk kader is, want dat is immers internationaal vastgelegd en met de Kustwacht overeengekomen.</p> <p>Translation Dutch Safety Board: It was claimed that there was no common framework and understanding of the radar data provided by LVNL to JRCC and that the systems of LVNL and JRCC are not compatible. The Last Known Position data refers to a representation of the last radar observations and radar tracker extrapolations of the aircraft in question. It should be taken into account that radar observations at low altitudes are limited. Furthermore, an aircraft in distress can make unusual manoeuvres shortly before a crash. There will also be limitations to the radar observations in these cases. The data is not conclusive about where an aircraft crashed, but gives an indication of where the aircraft was last sighted as one of the input sources for determining a search area. The Last Known Position data is provided by LVNL in a standardized form with latitude and longitude coordinates. LVNL therefore does not understand the comment about there not being a common framework as this was established internationally and agreed upon with the Coastguard.</p>	No	This is an analysis of the situation of the Dutch Safety Board. Sending data in a standardised format does not automatically ensure correct understanding of the data presented. In the report it is indicated that the LKP tool enables timely and easy extraction of data. The investigation also showed that the explanatory information in the e-mail on actual and extrapolated data points does not meet the objective of creating a better understanding of the data presented.
29	LVNL	3.2.2	"The LKP tool ... operation"	<p>De door LVNL verstrekte last known position gegevens zijn in een gestandaardiseerd formaat van lengte- en breedtegraden vermeld, overeengekomen met de Kustwacht. LVNL begrijpt daarom de opmerking niet dat er geen gemeenschappelijk kader is, want dat is immers internationaal vastgelegd.</p> <p>Verder is het feitelijk correcter om te vermelden dat het wrak van EC-ZAF kort na de crash al was gevonden door het Havenbedrijf Rotterdam.</p> <p>Translation Dutch Safety Board: The Last Known Position data is provided by LVNL in a standardized form with latitude and longitude coordinates, in accordance with the Coastguard. LVNL therefore does not understand the comment about there not being a common framework as this was established internationally. Furthermore, it would be factually more correct to state that the wreckage of EC-ZAF had already been found by the Port of Rotterdam Authority shortly after the crash.</p>	No	This is an analysis of the situation of the Dutch Safety Board. Sending data in a standardised format does not automatically ensure correct understanding of the data presented. The investigation showed that the explanatory information in the e-mail on actual and extrapolated data points does not meet the objective of creating a better understanding of the data presented. The fact that wreckage was found, has no influence on the relevance of this finding.
30	LVNL	3.2.2		<p>Naar aanleiding van het eerdere voorval nabij de Maasvlakte is een aantal safety aanbevelingen gedaan die hebben geleid tot bezoeken aan de kustwacht, presentaties van de kustwacht in cursussen en werkafspraken in de Operations Manuals. In de tekst dit graag opnemen.</p> <p>Translation Dutch Safety Board: An earlier occurrence near Maasvlakte resulted in a number of safety recommendations that led to visits to the Coastguard, presentations by the Coastguard at training courses and agreed working practices in the Operations Manuals. Please include this in the text.</p>	No	The initiatives taken by LVNL before 5 June 2022 are noted. The investigation into the EC-ZAF accident did not include a follow-up safety recommendations that lists all the actions taken following the 2013 accident investigation.

No.	Organisation	Section	Text to be corrected (first ... last word)	Argumentation	Adopted	Dutch Safety Board response
31	LVNL	4.1	"Analysis ... reference" Suggestie: "The prevailing weather at the time and location some time before the accident was in general VMC with a discernible horizon and the surface in sight. It cannot be determined whether the weather conditions during the last part of the flight were such that the pilot experienced spatial disorientation due to loss of visual reference."	Zie ook de eerdere opmerking op pag. 31. Er wordt gesteld dat de oorzaak van het ongeval niet kan worden vastgesteld. Tegelijkertijd wordt verderop gesteld dat het niet aannemelijk is dat de vlieger in het laatste deel van de vlucht gedesoriënteerd is geraakt. Dit is echter niet zo feitelijk en strookt niet geheel met het feit dat het toestel steeds lager is gaan vliegen. Het is passender om de conclusie hierover nog wat feitelijker te verwoorden. Zie voorstel links. Translation Dutch Safety Board: Also see the previous comment on page 31. It was claimed that the cause of the accident could not be determined. At the same time, it was later claimed that it is unlikely that the pilot became disorientated during the latter part of the flight. However, this is factually not the case and is not entirely consistent with the fact that the aircraft started flying lower and lower. It would be more appropriate to phrase the conclusion in even more factual terms. See proposal (at left).	Partly	As indicated in the report, an extensive analysis of the available weather information was performed to determine the actual weather conditions at the location and time of the accident using also meteorological satellite and radar data. Some explanatory text has been added.
32	LVNL	4.2	"First ...Maasvlakte."	Er wordt gesteld dat er ten tijde van het ongeval van EC-ZAF geen duidelijk inzicht bij LVNL bestond wanneer JRCC te informeren. Dit is niet correct. In de LVNL operatie zijn heldere procedures voor het informeren van JRCC. Omdat er van het toestel tijdens de vlucht geen gegevens bekend zijn, is de situatie nadat het niet langer door de radar wordt waargenomen ongewis. De FISO en de ACC SUP houden er op dat moment rekening mee dat het toestel op lage hoogte de vlucht vervolgt of is geland op een bestemming anders dan een luchthaven. Dit laatste gebeurt met name bij helikopters. De minimum hoogte waarop vliegtuigen door de radar worden waargenomen is afhankelijk van de positie en de omstandigheden. In het betreffende gebied is het niet ongebruikelijk dat de radarwaarneming op ca. 500ft wegvalt. Translation Dutch Safety Board: It is claimed that at the time of the EC-ZAF accident it was unclear to LVNL when to inform JRCC. This is incorrect. LVNL has clear procedures for informing JRCC. Because no aircraft data for the flight was available, the situation after the aircraft could no longer be detected by radar is uncertain. At that time, the FISO and the ACC SUP will factor in that the aircraft continued its flight at a low altitude or landed at a destination other than an airport. The latter is particularly the case for helicopters. The minimum altitude at which an aircraft can be detected by radar depends on the position and circumstances. In the area in question, it is not unusual for radar observations to disappear at about 500 ft.	Partly	The report already includes the actions taken by LVNL as well as the uncertainties. The text has been amended to reflect that LVNL has recently amended the QRH regarding informing JRCC.
33	LVNL	4.2	"Second .. unclear" "Direct contact and communication between LVNL and JRCC is essential in order to be able to provide relevant information"	Zie ook de eerdere opmerking over pagina 35. In gezamenlijke afspraak met LVNL informeert het Havenbedrijf de Kustwacht. Restanten van de EC-ZAF waren op dat moment al gevonden. Het Havenbedrijf beschikt over een exacte positie en een betere situatiebeschrijving dan LVNL. Het is logisch en verklaarbaar dat het Havenbedrijf de Kustwacht informeert. LVNL verstrekt daarna de Last Known Position, het vliegplan, departure bericht en POB volgens de procedures aan de Kustwacht. Translation Dutch Safety Board: Also see the previous comment about page 35. As agreed with LVNL, the Port Authority will inform the Coastguard. Remnants of the EC-ZAF had at the time already been found. The Port Authority had an exact position and a better situation description than LVNL. It makes sense and is understandable that the Port Authority informs the Coastguard. In line with the procedures, LVNL would then provide the Last Known Position, the flight plan, departure message and POB to the Coastguard.	No	According to the regulatory framework, LVNL has the task to inform JRCC. Only through this direct contact, it can be determined what information JRCC needs and how LVNL can support JRCC in the best manner.

No.	Organisation	Section	Text to be corrected (first ... last word)	Argumentation	Adopted	Dutch Safety Board response
34	LVNL	4.2	"Third ... data"	<p>Omdat er van het toestel tijdens de vlucht geen gegevens bekend zijn, is de situatie nadat het niet langer door de radar wordt waargenomen enige tijd ongewis. Er wordt rekening mee gehouden dat het toestel op lage hoogte de vlucht vervolgt of is geland op een bestemming anders dan een luchthaven. De minimum hoogte waarop vliegtuigen door de radar worden waargenomen is afhankelijk van de positie en de omstandigheden. In het betreffende gebied is het niet ongebruikelijk dat de radarwaarneming op ca. 500ft wegvalt. Daarom is het niet reëel om het uitgangspunt van verlies van radarwaarneming te gebruiken als nulmeting voor het moment dat de last known position gegevens zijn verstrekt. Bovendien was het wrak van het toestel intussen al gevonden.</p> <p>De door LVNL verstrekte last known position gegevens zijn in een gestandaardiseerd formaat van lengte- en breedtegraden vermeld.</p> <p>Translation Dutch Safety Board: Because no aircraft data for the flight was available, the situation after the aircraft could no longer be detected by radar was uncertain for some time. The fact that the aircraft could have continued its flight at a low altitude or landed at a destination other than an airport was taken into consideration. The minimum altitude at which an aircraft can be detected by radar depends on the position and circumstances. In the area in question, it is not unusual for radar observations to disappear at about 500 ft. It is therefore not realistic to use the premise of loss of radar detection as a baseline assessment for the time at which the Last Known Position data was provided. Furthermore, the wreckage of the aircraft had already been found. The Last Known Position data is provided by LVNL in a standardized form with latitude and longitude coordinates.</p>	No	At the time parts of the wreckage was found, there was still uncertainty. The timeframe mentioned is a factual statement. The escalation of the situation by the FISO 10 minutes after the loss of radar track, could also have been a reason to already initiate certain actions, for example the Last Known Position. This has been clarified in the text.
35	LVNL	4.3	"A video ... read back"	<p>Er wordt gesteld dat de radio frequentie was ingesteld op de incorrect teruggelezen frequentie. Dit klopt niet helemaal, want de vlieger leest terug one three five decimal three five zero terwijl 135.355 blijkt te zijn geselecteerd.</p> <p>Translation Dutch Safety Board: It is claimed that the radio frequency was set to the incorrectly read back frequency. This is not entirely correct because the pilot read back one three five decimal three five zero, while 135.355 appears to have been selected.</p>	Yes	The text has been amended in line with the comment.
36	AESA	Appendix E	According with annex E, the measured speed by the radar ranges between 61kts and 67kts. However, is not specified whether the measured speed is Ground Speed or Indicated Airspeed.		Yes	The speed indicated in the Last Known Position output table is ground speed. This has been clarified in the description.
37	AESA	Report	According with the report project, the aircraft overflies the airspace of different countries. It is not specified if this overflight was granted (overflight authorization or declaration) as stated in article 2.3 d) of Regulation (EU) 2018/1139: "Without prejudice to the obligations of Member States under the Chicago Convention, aircraft covered by Annex I to this Regulation and registered in a Member State may be operated in other Member States, subject to the agreement of the Member State in the territory of which the operation takes place."		No	The pilot filed a flight plan for the flight. Whether or not additional agreement of other Member States was required was outside the scope of this investigation.
38	IenW	Report	Dyn'Aero MCR-01 BAMBI	The term BAMBI is probably a typing error and should be Banbi or Ban-Bi, see link: http://all-aero.com/index.php/contactus/45-planes-d-e-f/3158-dynaero-mcr-01-ulc-ban-bi	No	The Dutch Safety Board refers to the aircraft type as it was registered in the Spanish national aircraft register.