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Sonja Lister
Eastern Busway Alliance Consent Planning Lead
Auckland Transport
Private Bag 92250
AUCKLAND 1142

By email: sonja.lister@aucklandtransport.govt.nz

Request for further information in accordance with section 92 of the Resource Management Act 1991

Notice of requirement: Eastern Busway EB2 (Auckland Transport)

Resource consents: Eastern Busway EB2
BUN60407133 LUC60407134 DIS60407135 (NES - FW)
DIS60407492 (Earthworks/Contamination)
CST60408360 (Occupation)
CST (Disturbance) – reference to be confirmed

Eastern Busway EB3R
BUN60407121 LUC60407123 DIS60407122 (NES - FW)
DIS60407493 (Earthworks/Contamination)
CST (Occupation) - reference to be confirmed
CST (Disturbance) - reference to be confirmed

We are writing with respect to the notice of requirement (NOR) and resource consent applications lodged for the Eastern Busway project.

After completing a preliminary assessment of documents lodged for the NOR and resource consent applications, we consider that further information is required to enable an adequate analysis of the proposals, their effects on the environment, and the way in which any adverse effects on the environment may be mitigated or avoided. Provision of this further information is also sought to ensure potential submitters are able to adequately assess the extent to which the NOR, resource consent applications, and associated environmental effects will/may affect their interests.

Please note that formal comment has not yet been received from Watercare Services Limited. Any comments will be forwarded upon receipt.

The information requested below will also enable the council to undertake a full and proper assessment of the NOR and resource consent applications, and provide recommendations on each proposal.

Where appropriate, this request identifies whether the request relates to the NOR or the resource consent applications. However, a number of requests relate to both.

Under section 92 of the Resource Management Act 1991 (RMA), we request the following further

information:

EB2 NOR – Planning General

- (1) Please confirm the proposed use of the land bounded by the Cortina Place extension, Reeves Road, the new bus station and Aylesbury Street. On the landscape plans this appears to be a park/open space, but this does not appear to be described as such in the Assessment of Effects on the Environment (AEE). Please advise whether this land will be zoned open space, and whether Auckland Transport (AT) will take long-term responsibility for its maintenance?
- (2) Please explain notations on the Land Requirement Plan. There appear to be parts of the proposed designation that will be removed but will still be required as road, and others that will not. Please explain the reasoning for this and how it will work long term.
- (3) On 18 August 2022 the Council notified a number of changes to the Auckland Unitary Plan, Operative in part 2016 (AUP:OP). Please consider whether any of these require some changes to your assessment, particularly in respect of the objectives and policies assessment. For example, the zones referred to in the submitted assessment may have changed and new objectives and policies have been proposed, some of which will have immediate legal effect.
- (4) In section 12 of the AEE document a 10 year lapse period is sought for the designation. However in section 10 of the NOR document a 15 year lapse period is sought. Please confirm the lapse period sought.
- (5) The designation map boundary (Land Requirement Plan.pdf) does not conform to the EB2/EB3 boundary on most of the other plans (i.e. the Reeves Rd/ SEART and Te Rakau Drive intersection). Please confirm this boundary and update the map.

Please also note the comment under Urban Design regarding the consideration of the northern section of William Roberts Road (south of Reeves Road).

- (6) Some of the maps provided in various reports provide for a different border between EB2 and EB3 that what is specified in the initial set of maps. This includes the Key Plan section. In order to avoid confusion please provide that all maps show the correct boundary.
- (7) Please confirm whether it is intended to lodge OPWs for the various construction yards or rely on the descriptions set out in the AEE document.
- (8) Please provide copies of, or web links to, the local and community plans set out on page 47 of the Social Impact Assessment (SIA) document.
- (9) Please explain how the assessment of alternatives for the Reeves Road Flyover (RRF) and the Bus Station has integrated RMA matters with business case matters, and how priorities were established. Please explain why different criteria were used for the RRF and the Bus Station assessments.
- (10) Please graphically illustrate the 20 options for the RRF set out in table 5 of the EB2 Options Report.
- (11) Please explain how the project objectives, as set out in the Eastern Busway EB2 Options Report, relate to the RRF. The objectives seem to be very much focused on the busway and bus station

rather than the flyover.

EB2 and EB3R RC – Planning General

Construction Plans

A number of sets of Plans have been provided as part of the application, where separate Appendices have been provided for Land Requirement, Consent Plans (which relate to the General Layout, Architectural and Road details) and Landscape, Ecological and Arboricultural Mitigation Plans, all of which provide details of the proposal upon completion.

It is difficult to easily locate plans associated with the scope of works proposed as part of construction, particularly with regard to the reasons for which consent is sought (overall extent of earthworks, mangrove removal, earthworks and vegetation clearance in/proximate to a natural wetland).

- (12) Please provide a collated set of plans that identify construction works including, but not limited to:
- a. The extent of earthworks proposed as part of construction, including details of cut and fill (referenced in the Earthworks and Streamworks discussion);
 - b. The extent of earthworks located in or within 100m of a natural wetland (referenced in the Earthworks and Streamworks discussion);
 - c. The extent of mangrove removal; and
 - d. The extent of vegetation clearance located in or within 10m of a natural wetland.

Management Plans

A suite of Draft Management Plans has been provided as part of the application where further management plans and reports that are required as part of the proposed conditions set are yet to be drafted.

- (13) Notwithstanding the information sought by specialists in the following requests in this regard, in order to understand the scope and level of detail proposed to be provided within the Habitat Restoration Plan (which compliments the Lizard Management Plan) and an Urban Design and Landscape Plan (UDLP) in particular, please provide examples of such plans that have been recently prepared by AT.

Please note the UDLP example should include details of Landscape Mitigation Planting and Ecological Mitigation Planting as set out in the Landscape, Ecological & Arboricultural Mitigation Plan submitted.

EB2 RC – Planning General

Scope of Works – William Roberts Road (South)

- (14) As will be discussed in further detail on Urban Design, EB2 in conjunction with the William Roberts Road Extension (currently being processed by way of resource consent LUC60401706) result in works along the entire extent of William Roberts Road as set out in Figure 4-1 below.

However, the extent of the works as set out in the General Arrangements Plans are limited to the intersection of William Roberts Road and Reeves Road.

Further details are required to understand the function and appearance of the entirety of this part of William Roberts Road upon completion of works.



Figure 4-1 Location of Works for EB2

EB3R – Planning General

105 Ti Rakau Drive

This site is being used as both a permanent carpark, and a temporary parking area during construction.

- (15) Information on this parking area(s) is spread between a number of documents and plans. In order to understand the functioning of the parking area and its interface with neighbouring properties and streetscape in both configurations, please provide consolidated scaled plans which set out:
- The carpark access to enable assessment of the parking area against the relevant access and parking standards within E27 of the AUP:OP;
 - Pedestrian connections between the carpark and the Edgewater Shops the parking area is designed to serve;
 - Landscaping (if relevant); and
 - Boundary treatments with adjacent properties.

Please also provide details of any lighting and/or security arrangements for this parking area.

- (16) Please advise the duration the parking area is intended to be used for in its 'temporary configuration'.

Industrial Trade Activity (EB2, EB3R)

- (17) Please provide an assessment under E33 of the AUP:OP for the whole developed site.
- (18) Please provide locations and the total areas (m²) of the construction yards for the whole development detailed within the Master Plan, identifying type of materials that will be stored and for how long.
- (19) Please clarify where the stormwater will drain from the above identified Industrial Industrial Trade

Activity areas. In case the runoff will pass via a stormwater treatment device, it will be in non-compliance with Standard E33.6.1.2 (1) and will trigger a consent under Rule E33.4.2 (discharge of contaminants).

- (20) Please provide a draft environmental management plan which is required at this stage. The final copy can be conditioned and attached with the Industrial Trade Activity catchment plan.

Parks (EB2, EB3R)

- (21) Please provide mitigation landscaping plans for all open spaces affected. This is typically a requirement under schedule 4 of the RMA. This should be suitably detailed and include general species selections, densities and planting grades/size at the time of planting.
- (22) Please show how you have addressed low speeds and traffic control or pedestrian rights-of-way for roads adjacent to parks, especially where there are sport clubs.
- (23) Please explain how safe public access will be retained throughout the construction period to open spaces and esplanade reserves.
- (24) Please explain whether the directly affected sports fields (i.e., Ti Rakau and Riverhills), will be able to be used during construction, and whether there are any proposals to relocate the clubs during construction? And if so, for how long? Please also explain how the construction will affect parking around these clubs.
- (25) Please explain how the bus stations and shared used paths integrate with the existing open spaces where it may have severed the open space.

Social Impact Assessment (EB2, EB3R)

- (26) Please provide a detailed description of the specific project elements to be assessed (p15 and 16)

Understanding what is being assessed is a key early step in assessing potential impacts (Section 3.2.1 and Section 3.2.2). The current lists have a limited description of the project features, and instead mostly include commentary on potential outcomes – which is the purpose of the specialist assessments and would not typically be in the project description. For example, all that can be determined from the project description in the SIA about the Reeves Road Flyover is that it is an ‘elevated structure.’

The rest of the material in the RRF dot point relates to potential outcomes. For example, given it is a flyover, the treatment of the spaces running the full length beneath the flyover would likely be critical to achieving outcomes for crime prevention, amenity, pedestrian usage, cyclist usage and the access between community facilities, but there is no information presented on this in the SIA.

For the U-turn facilities on EB3R it is not clear whether they are signalised and in phase with other traffic lights. Such details greatly affect potential outcomes but are not provided. These are just two examples of where there is insufficient detail about the project, and as such it is difficult to review whether the potential effects identified in the SIA are appropriate or not.

- (27) Please provide an assessment of vulnerable groups

The methodology and analysis section (4.1) describes: ‘However, awareness of the differential distribution of impacts among different groups in society, particularly the impact burden experienced

by vulnerable groups in the community should always be of prime concern.’ However, engagement with vulnerable groups is unclear, and little analysis/assessment is undertaken as the population groups assessed are geographically determined, and not determined by need. In a transport project, vulnerable groups to assess would typically include people with disabilities, older people e.g., the residents of 33 Dale Crescent or 14 Edgewater Drive, and children. Given the number of businesses potentially affected, small businesses could also be added. Community engagement would assist in determining if these were the only appropriate groups to consider.

On occasions, vulnerable groups are discussed, e.g., in *Community Severance* (Section 7.3.1.1.3) disability is mentioned, however, potential social effects are not described for people with disabilities. AT Capital Projects Accessibility Group is cited as solving access problems with no direct link back to the issues identified in this project, and it appears that tactile paving, wheelchair access and visually contrasting ground surfaces are to be used in the construction period, whereas they are more likely operational outcomes?

While pedestrian access is assured for all businesses and facilities during construction, is that access suitable for vulnerable groups? There is insufficient information provided to understand the potential effects on vulnerable people.

(28) Please provide an assessment of key organisations

The methodology and analysis section (4.1) describes that assessment is important ‘at the level of an individual person, an economic unit (family /household), as social group (circle of friends), a workplace (a company or Government agency) or by community/society general.’ The assessment largely considers community/society general with little reference to specific companies or organisations. For example, when considering construction access to connectivity (Section 7.3.1.1.2) the SIA states ‘Several commercial and residential properties in the EB2 neighbourhood area will have access impacted during construction works.’

It is unlikely that the social effects are identical across all organisations and there is insufficient information to understand potential social effects. For example, the medical centre may have a larger proportion of users who are sight impaired, physically disabled, neurodiverse, and/or anxious compared with other organisations. Or to put it another way, perhaps a business might experience a different social effect than a mosque – certainly given the different services they provide one would assume so? The social effect is considered to be ‘access and connectivity’, but that is the determinant of the social effect. If access and connectivity is restricted, the potential social effects of that for mosque worshippers is most likely different to that of medical centre visitors. But what are these social effects? And so it continues with schools, medical centres, businesses, residents, libraries, galleries or emergency services.

Therefore, the assessment should consider the extent, duration, magnitude, likelihood, consequence and impact rating for different types of organisations, the actual social effect, and once that is known some organisations might need different mitigation to others. The necessary detail is lacking in the assessment. This issue plays out in nearly every assessment section, where descriptions of effects are applied to a large groupings and the effects themselves are broad, rather than specific to any particular organisation or vulnerable group.

(29) Please provide a definition for each effect assessed and a thorough assessment for each effect chosen to be assessed.

The International Association for Impact Assessment (IAIA) SIA framework (Section 4.5) chosen is a broad description of potential categories to base an assessment on. The SIA continues to use the broad IAIA categories within the assessment chapter (Section 7). This leads to other concerns, as assessment headings such as “*People’s way of life, community and culture*” are bold in their breadth. *Way of life, community, and culture* are three separate categories in the IAIA SIA

framework, each a potentially enormous topic, but in this SIA are all rolled into one.

As such, there is insufficient detail in the SIA to understand the potential effects across these categories. For example, for culture, the SIA attempts to cover this topic within a single paragraph on *community character* (Section 7.3.1.1.1 and repeated in Section 7.3.2.1.1). What culture is, is not defined, and how culture relates to *community character* is not described. Social effects are not identified, *consequence*, *likelihood* and a *social impact rating* are not described in the text, nor in the summary (Section 7.5). This is one example of many throughout the assessment, where the SIA suggests significant topics will be discussed, but there is insufficient detail provided.

(30) Please provide the literature review

Section 4.3 describes a '*literature review has been undertaken*'. It is normal practice with a literature review to describe the research questions that are being asked/answered, the search strategy used, and a summary of findings. In particular, the empirical evidence regarding transport interventions and social outcomes is a critical component of a literature review.

The description of documents included in the *literature review* (Section 4.3) appears to include all written documents that have been read for the SIA, which is unusual for a literature review. While it is usual in a SIA to read consultation reports, local policy, and other technical assessments etc, unless they help in answering the research questions set for the literature review by uncovering empirical evidence, they would normally be described/discussed separately.

Section 5 of the SIA is headed '*Review of social impacts from transport projects.*' However, this heading is somewhat misleading as the documents reviewed are SIAs, and SIAs rarely provide evidence about actual social effects. Rather, they instead project potential effects. A review of topics covered in SIA is helpful to inform what topics might be assessed in an SIA. There is insufficient detail about the literature review undertaken and the findings from it.

(31) Please include the voice of local stakeholders and those being assessed in the SIA and then address/respond to those concerns within the SIA.

In Section 4.7 the SIA team acknowledge '*social impact engagement is a limitation of this assessment.*' Acknowledging this is the first step, the second step is rectifying it. Community interviews and community open days were held by the planning team, and some relevant questions were asked. The SIA team say they have '*analysed the findings of the consultation feedback reports*' however, the data reflecting this community voice is only sporadically articulated in the SIA and any rationale for why community concerns might be unfounded is not presented.

To provide sufficient detail, separate presentation of community data about social concerns is requested. For example, Section 6.7.4 says 'Engagement with educational facilities raised concerns about safety, road layout, and accessibility for educational facilities including Edgewater College, Riverhills School and the ability for parents and students to access the school(s).' The assessment section (7.3.2.1.3) focuses only on 'Edgewater College is currently accessed by school buses...' and the discussion becomes about how to enable a U-turn by buses on Edgewater Drive. In Section 7.5 Summary of Effects, the assessment results for Edgewater College and proposed mitigation do not appear. Overall, it appears the voice of the school community has been slowly quietened as the document continues, providing little to no assurance that concerns have been heard or addressed, or the school community provided reassurance that the current design is appropriate. Simply, there is insufficient detail.

(32) Please clearly identify social effects arising from altered transport outcomes.

The SIA's role is to assess social outcomes arising from alteration to transport outcomes, yet on

many occasions the SIA stops the assessment at the transport outcome, or presents cursory social effects. For example, DW Family Doctors, is being displaced with no current surety of another location (Section 7.3.1.2.1). A close reading of the characterisation of effects is “*The loss of these facilities will be felt at a local community level...*”; “*...the loss of these facilities still has the potential to affect existing patients and the community...*” and “*patients may not be able or willing to relocate to a different practice which may result in delays seeking help and poor health and wellbeing.*” The last sentence is the only sentence which describes a potential social effect.

It is considered that the medical centre and patients who go there have far more to say than one sentence about the potential social effect from displacement. Yet, the likelihood of this occurring is described as ‘*possible*’, which is defined as ‘*might occur at some time.*’ This appears to substantially under-rate the likelihood of an effect occurring. It is noted that the likelihood for many of the other assessments are also rated as ‘*possible*’, when categorisation of ‘*likely*’ or ‘*almost certain*’ appear more suitable.

- (33) Please provide the meeting notes from individual meetings with each of the stakeholders in the *consult* and *involve* columns in Table 4.

To be able to determine if the breadth of concerns of residents and organisations have been appropriately assessed in the SIA, the notes for each of the individual meeting are requested. These notes will provide sufficient information on the context of the facilities such as how many people attend for what purpose, relative availability of similar facilities in the local area, who accesses the facilities, by which mode of transport, any particularly vulnerable groups, positive and negative comments on the design, and suggested mitigations, etc. Referenced documents in the SIA provide insufficient detail about community concerns.

- (34) Please provide a discussion of the evidence underpinning each assessment, along with the scale of people impacted, time period and severity - for each topic assessed and for each population assessed. The pre- and post-mitigation effects, with the mitigation clearly described for each, are also needed.

Each assessment topic in Section 7 considers *consequence* and *likelihood*, however *consequence* is broadly defined in the method section, incorporating extent, duration and magnitude. Within the discussion there is little reference to the characteristics of the impact rating described in the method (Section 2.2.4.2) e.g., number/magnitude of people impacted, time period/duration of exposure, severity/consequence.

It is considered that this information would be provided for all topics, all backed up by a discussion drawing on the project description, literature review, community data and finally the assessor’s judgement. The effects pre and post-mitigation, with the mitigation clearly described for each, are also needed, in one discussion. At present it is difficult to follow the judgements made and there is insufficient detail.

Below is a single summary example from another SIA, that Robert Quigley (council’s social impact specialist) has recently reviewed that clearly laid out the information for the reader for each social topic assessed, including (1) description of the impact topic; (2) An assessment of the potential impact; (3) The mitigation proposed; and (4) A summary of the impact assessment pre- and post-mitigation. A hyperlink to the SIA is [here](#).

Impact Assessment

REDUCED WELLBEING (DUE TO ANXIETY AND /OR CHANGES IN THE QUALITY OF THE ENVIRONMENT)		
Phase: Construction and Operation	Pre-Mitigation Assessment	Post-Mitigation Assessment
Extent	Local area	Local area
Duration	Medium term	Medium term
Magnitude	Few affected	Few affected
Consequence	Minor	Minor
Likelihood	Possible	Unlikely
Significance	Moderate	Low

- (35) Please provide an analysis that clearly describes what is being assessed versus a counter factual.

At present there is no mention of the counter factual. Is it the status quo? A counter factual is the basic premise of all impact assessment but is not mentioned. Instead, the SIA describes effects without any comparator. Clearly setting out what is assessed should occur in the methods section and be implemented in the assessment section.

- (36) Please include an assessment of potential social effects for residential areas with a high risk of offensive or objectionable dust nuisance and provide reassurance that the mitigation will achieve a low social effect.

The Air Quality Assessment concludes Te Tuhi (Area B in the Air Quality Assessment) has the potential to experience a *medium risk* of objectionable dust, and residential areas (Areas A and C) a *high risk*. Within the SIA, only Te Tuhi is considered under air quality. The mitigations referenced in the SIA are generic but are heavily relied upon to achieve *low* social effects. Sensitive receivers like Te Tuhi are only metres from an elevated work site and there is insufficient information to determine what the social effect may be.

- (37) Please assess potential social effects arising from operational noise exposure for vulnerable populations and residences exceeding noise standards

The SIA has taken the overall noise assessment summary and applied it to all properties. Please consider the land uses of those properties experiencing *moderate adverse* and *significant adverse* noise effects (in Appendix D, operational noise assessment) and work with the affected properties to identify if a social effect might arise or not. For example, one of those addresses experiencing a moderate significant adverse noise effect, 33 Dale Crescent, is a retirement village. The SIA discounts social effects from noise because the '*noise levels are not unexpected for an urban environment*', however that is not the premise for social impact assessment; it is project versus no project.

Furthermore, Appendix D of the operational noise assessment shows many properties exceed NZS 6806 noise criteria during operation with mitigation 4, and no assessment of social effects on those properties is carried out. At present there is insufficient information to understand the potential social effects arising from noise.

- (38) Please provide additional information about the neutral social effect arising from the RRF, day and night, and along the full length of the flyover.

Section 7.4.1.4.4 says 'With the proposed design features which are anticipated to create an attractive and safe environment underneath the flyover the social impact rating is considered

neutral.' Please identify where the assessment of an attractive and safe environment is from? The Landscape and Visual Assessment does not assess safety (or severance, or access to facilities), though it does report a moderate to high negative effect for some residential viewing audiences; and low-moderate for Pakuranga Community Centre (p49). At present there is insufficient information to understand the potential social effects arising from the flyover, especially at night, or along the full length as the flyover moves away from the town centre and lowers to the ground.

- (39) Please consider the RRF in the 'Fear of Crime' assessment.

Section 7.4.1.5.1 *Fear of crime* does not include an assessment of the flyover space, especially at night and along the full length of the flyover space.

- (40) Please cross reference mitigation proposed with lodged conditions.

It is difficult to see the mitigation proposed in the SIA within the *Designation Conditions* document or *Resource Consent Conditions* document as there is no cross-referencing in the SIA, nor a specific section for social conditions in either. The word 'social' is not in either document.

- (41) Please clarify Figure 4-25 of the AEE.

Figure 4-25 shows the layout of the Bentonite/polymer plant. The quality of the image is too low to understand what the brown shading represents, especially the shading in front of Te Tuhi.

- (42) Table 6 and 7 in the air quality assessment reports a score of 1 for '*sensitive receptors may be downwind of the construction area under prevailing wind conditions*'. Yet sensitive receptors are described in Section 5.1 of the air quality assessment, and some are downwind of construction activities. Should this value be 1 in those situations? And the flyover is an elevated structure, does that get reflected in the Table 6 assessment? The approximate time duration for construction of the RRF is three years according to p51 of the Integrated Transport Assessment but is '*more than one year*' in Table 6 of the dust assessment for all areas assessed, including Te Tuhi. Might this be an underestimate? The timings for construction are presented in the EB2 AEE (p45) but provide little detail on when each of the Areas in the air quality assessment might actually experience construction

Ecological (EB2, EB3R)

- (43) The National Policy Statement on Freshwater Management requires that the potential ecological values of wetlands is to be assessed. Please provide this assessment to determine the level of ecological effects on natural wetlands.

Arboriculture (EB2, EB3R)

A Tree Protection Management Plan (TPMP) has been submitted as part of the proposed applications. Item 1.6 TPMP Certification and Review sets out that:

"Once certified, minor amendments as a result of changes in design, construction materials, methods or management of effects can be made to the TPMP without the need to seek recertification provided that the amendments are agreed to by Council, prior to the implementation of any changes. If no written response is received from Council within 10 working days of the management plan being submitted for certification, the TPMP will be deemed to have certification and works can commence," and

"any additional trees noted during site walkover as requiring removal/pruning/works within rootzone (but not identified on the Tree Plans as requiring any works) will be discussed at the construction pre-start

meeting. Any recommendations/actions arising from this meeting will be recorded on the Arborist Meeting Minutes form as evidence of agreed actions.”

- (44) This provision does not identify that any amendments and written response must be in consultation with the Community Facilities Urban Forest Specialist (Arborist) who has the delegated authority to issue their Tree Owner Approval (TOA) for the removal, pruning and works in the root zone of public trees. As no TOA has been issued yet, and the TOA application only seeks approval for trees removals identified in the Arborlab Tree Assessment Report, please confirm that the Community Facilities Urban Forest Arborist is aware of, and agrees to, this provision.

Should a TOA be issued following the issue of this correspondence, please provide a copy of this TOA in order to confirm the extent of works agreed to and conditions imposed by the Tree Owners of any public trees (Community Facilities Urban Forest).

Acoustic (EB2, EB3R)

Construction noise and vibration

- (45) The construction noise and vibration assessment includes an assessment of effects across several sections but most comprehensively in section 7. The appendices include large tables of receiver addresses and predicted noise and vibration levels for various phases of work. It is difficult to combine these parts of the document to determine the overall magnitude of construction noise and vibration effects that are likely to be generated by the project.

Please provide a chart or other method of showing the number of receivers that are predicted to be exposed to different levels of effects.

The objective of the request is to provide a clear and understandable description of the overall magnitude of construction noise and vibration effect that the projects will have, by level, effect and number of receivers. For example, Table 12 could have a column added that sets out the approximate number of residential and commercial receivers that are predicted to receive noise levels in each bracket of noise effect. The same could be performed for Table 13 (vibration). This is one suggestion. There may be other methods that could satisfy the request.

- (46) The appendices demonstrate that some of the receivers are predicted to experience noise and vibration levels that are high enough to cause significant adverse effects. The precise extent (especially for vibration) and approximate duration of the effects are not known. It is therefore impossible to determine whether there are going to be receivers that suffer significant disruption during the works that might last for a period long enough to cause an overall significant adverse effect. Please provide an assessment that:
- Shows the receivers that are subject to noise and vibration levels that are above the project standards for short periods, (perhaps a few days to a week);
 - Shows the receivers that are subject to noise and vibration levels that are above the project standards for longer periods, (perhaps 1-4 weeks);
 - Shows the receivers that are subject to noise and vibration levels that are above the project standards for short periods, (perhaps longer than 4 weeks).
- (47) Please describe the likely degree of effects on the receivers in Categories b and c above so that the overall level of effect can be determined. This assessment might demonstrate (for example) that some businesses or dwellings (near to parts of the project where there is a significant volume of work) are predicted to receive noise or vibration levels above the project standards for long periods, and that the standard noise and vibration measures may not be sufficient.
- (48) If the assessment arising from questions 46 and 47 demonstrate that the effects may be significant, (causing business disruption or long term (> several weeks) of serious residential disruption) please propose mitigation measures that could be employed to adequately mitigate these effects. These

may include temporary relocation (for example).

- (49) Please identify any businesses or activities that might be particularly sensitive to vibration due to the equipment they use, processes or products they provide, or where their particular circumstances are such that the construction vibration will cause business disruption. If there are any businesses in this category, please identify appropriate mitigation measures to adequately mitigate the effects.

Operational noise

- (50) Section 5.2.8 of the Operational Noise Assessment describes a “self-screening” bridge. Please describe what this means, and how the traffic noise will be screened in the manner described.
- (51) Section 5.2.9 of the Operational Noise Assessment sets out that the speed limits in several sections of the existing road are expected within the transport model at the time of growth under the do-nothing scenario. The assessment goes on to state that this speed limit reduction has not been included in the do-nothing predictions for the Design Year because, “NZS 6806 states that the Do Nothing scenario should include no alterations to the roads assessed.”

The relevant clause of NZS6806:2010 is the definition of ‘Do-Nothing’ in section 2.2. Section A2.2 contains helpful text for a worked example. The definition of do-nothing is (emphasis added) :
The predicted road traffic noise level at the assessment position(s) of protected premises and facilities and the design year assuming no alterations are made to the existing road.

The text in A2.2 (for the worked example) states (emphasis added):
Using an appropriate noise model ... predict noise levels for the design year taking into account the future traffic flow (AADT), and assuming no alterations are made to the existing road layout.

The text in A2.2 makes it clear that an ‘alteration’ is a physical change to the layout. The operational noise assessment suggests that altering the speed limit is an alteration to the existing road, and so has excluded it from the do-nothing scenario. This is inconsistent with NZS6806:2010.

If the future alteration to the speed limit in the do-nothing scenario is not incorporated in the do-nothing scenario, but is in any of the future design scenarios, the assessment of noise effects will automatically show that any design scenario will generate lower noise levels than the do-nothing, because the speed limit drop is incorporated. This is artificial and misleading. If the project does not go ahead (i.e. the do-nothing) the speed limits will drop before the design year and the noise levels will reduce. This is an actual and predicted change that should be incorporated in the do-nothing scenario, just like traffic growth over time is incorporated.

Please adjust all of the do-nothing noise level predictions to take into account the speed limit reductions that will occur with growth. This will lower the noise levels for the do-nothing scenario across large parts of the project and will allow a true and accurate description of the actual change in noise level and effect that will arise for the various options when compared to the do-nothing. Once the do-nothing noise level predictions are adjusted, it is expected that there will be a number of consequential changes required throughout the assessment (such as Figures 7 and 8, and much of the accompanying text).

- (52) Section 5.5 states that the noise level assessment for buses has been undertaken on the basis that 100% of the bus fleet will be electric in the Design Year (2048). The design year is approximately 26 years away. Allowing for the construction phase, there may be 20 years of use of the roads before the Design Year arrives. This is a significant period of time. It is expected that there will be a transition in the bus fleet from diesel to electric that will occur over time. However, it is not known when that transition will start or how long it will take.

Please provide some insight into the probable amount of time it will take for the bus fleet to transition

to 100% electric. If that time is more than 1-2 years from the opening of the busway, please provide an assessment of bus noise using 100% diesel fleet and perhaps a 50% diesel / 50% electric fleet. This will enable the effects of buses over the next 26 years to be properly understood. This request includes the busway generally and the specific effects around the bus stops.

(53) Section 5.6 of the assessment contains a very brief assessment of the noise effects of the project. Please provide a meaningful and sufficiently detailed assessment of the noise effects that refers to, and explains the effects of the project against, the objectives of the World Health Organisation Environmental Noise Guidelines for the European Region (2018) and the specific recommendations for road traffic noise. This should include any statistical analysis to demonstrate how the predicted noise levels compared to the recommendations. The assessment may also refer to other publications or research such as Miedema and Oudshoorn.

(54) The assessment of the effectiveness of road-side barriers discounts them entirely because they do not screen the upper storeys of multi-storey buildings. This ignores the potentially significant benefit that barriers can have on rooms at the ground floor and also the outdoor living environment.

Please provide more informative comment on the actual and potential benefits of barriers in a more holistic sense, that includes the potentially significant benefits at lower levels. The evaluation of the utility of barriers should be revised to have proper regard to the potentially significant benefits they can have at the ground floor.

(55) The proposal involves the removal of a number of buildings to make way for the project. New traffic lanes will be constructed on many of the properties that will be vacated. This will expose the houses immediately behind to greater levels of road-traffic noise. In some cases, the increase will be significant.

The noise assessment appears to rely on future development on the residual land to provide a degree of screening to mitigate the effects. However, it is not certain that the residual land will be large enough or reasonably able to accommodate future dwellings that will adequately screen the existing dwellings.

- a. Please demonstrate that it is certain that the residual land will be large enough and reasonably able to accommodate buildings that will adequately reduce the noise to existing dwellings;
- b. If it is not certain that development on the residual land will deliver the outcomes in (a), demonstrate what the Best Practicable Option will be to mitigate the effects and achieve a reasonable level of noise. This should include an assessment of screening options that includes the following:
 - An assessment of screening from barriers, acknowledging the significant positive effects they can have on ground floor and yard spaces;
 - An assessment against NZS6806 and the relevant recommendations of the World Health Organisation's Environmental Noise Guidelines for the European Region (2018).

Traffic (EB2, EB3R)

(56) Vehicle tracking plans: It is noted that the Integrated Traffic Assessment (ITA) does not appear to include vehicle tracking plans as part of its appendices. This information is required to provide confirmation of the proposed design layout meets the vehicle manoeuvring requirement and aligns with the Transport Design Manual standards. Please provide the vehicle tracking curve analysis for all intersections to demonstrate the feasibility and practicality of the proposed intersection layouts, with greater focus being placed on those with multiple turning lanes and overlapped movements according to the intended phasing operations.

- (57) Crash data currency: Section 3.8.1 of the ITA states that the crash data only covers the period from 2015 to 2019. Although it is acknowledged that the rationale may consider this data most relevant due to Covid effects from 2020 onwards, it is still important to identify any new crash trends derived from possible changes in new traffic patterns. Please provide an updated crash record to include all available data in 2022 to ensure all the latest safety risks can be identified.
- (58) Phasing diagrams: It is noted that the ITA includes relevant appendices to demonstrate phasing diagrams at different project stages. However, the 3-staged mid-block pedestrian crossing across Ti Rakau Drive between Marriott Road and Edgewater Drive has not been elaborated on. Please confirm how the intersections and associated phasing are expected to be operated, i.e., three standalone signalised crossings or staggered pairs?
- (59) Temporary pedestrian route detour: Section 5.3.2 describes the temporary rerouting of Bus 711, which will result in bus patronage to use Bus Stop 6127 on the western side of Ti Rakau Drive from the current Bus Stop 6060 inside the mall. Although there may not be a significant difference in travel distance, it will be problematic (if not dangerous) for pedestrians crossing Ti Rakau Drive without crossing facilities in the vicinity of Aylesbury Street/Ti Rakau Drive intersection. Please provide further consideration and assessment of temporary crossing facilities to assist pedestrians in continuing to use bus services in a safe and efficient manner.
- (60) Bus travel time increase: It is evident that bus travel time through all parts of the overall project is expected to experience substantial increases during Construction Stage (CS) 1. Figure 1 (below) shows approximately 40% delay on Bus 70, which is one of the busiest routes in Auckland and likely to have a significantly negative impact on bus patronage and travel experience during this CS1 period (with potential effects longer term). Please provide identification, consideration and assessment of potential mitigation measures to reduce bus travel times during CS 1.

AM Peak						
Route Description	Westbound			Eastbound		
	Do Minimum [min]	Construction 1 [min]	Difference [min]	Do Minimum [min]	Construction 1 [min]	Difference [min]
70 – Botany to Auckland CBD	42.3	59.6	17.3	26.9	31.3	4.4
72C – Botany and Howick to Panmure	20.6	42.7	22.1	16.0	15.7	-0.3
72M – Botany and Howick to Panmure	-	-	-	15.8	15.9	0.1
72X – Botany and Howick to Auckland CBD	24.6	48.9	24.3	-	-	-
352 – Manukau to Panmure	36.8	46.2	9.4	29.1	29.0	-0.1
711 – Howick to Panmure	29.1	35.2	6.1	22.7	24.0	1.3
712 – Bucklands Beach to Panmure	22.6	30.6	8.0	16.6	15.5	-1.1

Figure 1: Significant Travel Time Delays during CS1 (Source: ITA-Table 33)

- (61) Similarly, it is noted that there will be an increase in bus travel time upon project completion as shown in Figure 2. It is expected that a flagship public transport improvement project such as the Eastern Busway will provide better travel or at least not worse travel times than currently.

Please clarify the main reasons for longer travel times for various bus routes as demonstrated within the following tables, some of which are at least 10% longer than the travel time in the Do Minimum scenario.

AM Peak						
Route Description	Westbound			Eastbound		
	Do Minimum [min]	EB2/EB3R Final [min]	Difference [min]	Do Minimum [min]	EB2/EB3R Final [min]	Difference [min]
70 – Botany to Auckland CBD	42.3	29.3	-13.0	26.9	30.3	3.4
72C – Botany and Howick to Panmure	20.6	-	-	16.0	-	-
72M – Botany and Howick to Panmure	-	-	-	15.8	-	-
72 – Botany and Howick to Panmure	-	21.0	-	-	20.1	-
72X – Botany and Howick to Auckland CBD	24.6	25.6	1.0	-	-	-
352 – Manukau to Panmure	36.8	25.1	-11.7	29.1	28.2	-0.9
705 – Meadowlands to Panmure	-	29.7	-	-	-	-
706 – Flatbush to Panmure	-	25.9	-	-	-	-
711 – Howick to Panmure	29.1	27.8	-1.3	22.7	25.5	2.8
712 – Bucklands Beach to Panmure	22.6	24.1	1.5	16.6	17.9	1.3

PM Peak						
Route Description	Westbound			Eastbound		
	Do Minimum [min]	EB2/EB3R Final [min]	Difference [min]	Do Minimum [min]	EB2/EB3R Final [min]	Difference [min]
70 – Botany to Auckland CBD	35.7	29.9	-5.8	38.1	31.1	-7.0
72C – Botany and Howick to Panmure	14.6	-	-	14.8	-	-
72M – Botany and Howick to Panmure	15.0	-	-	-	-	-
72 – Botany and Howick to Panmure	-	16.9	-	-	20.0	-
72X – Botany and Howick to Auckland CBD	-	-	-	16.8	24.7	7.9
352 – Manukau to Panmure	33.4	32.3	-1.1	27.9	32.4	4.5
705 – Meadowlands to Panmure	-	-	-	-	-	-
706 – Flatbush to Panmure	-	-	-	-	-	-
711 – Howick to Panmure	23.8	24.6	0.8	24.5	32.2	7.7
712 – Bucklands Beach to Panmure	19.7	22.0	2.3	18.1	25.9	7.8

Figure 2: Bus Travel Time Increase Upon Completion (Source: ITA-Table 45)

- (62) School Bus Services: Section 5.3.6 of the ITA discusses the continuation and potential changes in school bus services during various construction stages. Please describe and confirm that safe crossing points will be provided for school students where required.
- (63) Bus Priority Operations: It is not clear in the ITA if or where any bus priority techniques will be implemented along the corridor apart from dedicated bus lanes and associated phasing. The modelling results seem to favour reduction of private vehicle delays but no improvement of bus travel times. Please advise if bus priority operations will be included such as bus pre-emption or other techniques
- (64) Travel mode integration: The project may achieve a better overall outcome to allow integrated transport options. Please confirm your consideration and assessment of bicycle parking provisions at each bus station to provide convenient (and safe) transfer between travel modes.
- (65) Ti Rakau Drive/Pakuranga Road Intersection: The tightness of the turn through the south-eastern quadrant of this intersection is likely to accommodate waiting pedestrians at the crossings and create potential conflict with the adjoining two-way bicycle path. Please confirm consideration of this issue and provide possible design solutions to address this identified safety risk.
- (66) Ti Rakau Drive/Palm Avenue Intersection: There is a lack of cycling provision to connect with the Pakuranga Plaza area (also referred to as Pakuranga Town Centre), which is the main destination of the cycleway. Please confirm your design consideration of this matter and assessment of the cycling provision and connection on the eastern side of the intersection.

- (67) Cortina Place/Aylesbury Street Intersection: It is understood that the intersection footprint will need to accommodate large trucks. As a consequence, these large radii within the intersection will likely result in higher speeds being adopted by smaller vehicles and potentially create a hazardous environment for active road users (e.g., pedestrians). Please consider the combination of traffic calming and traversable aprons, as well as safe provisions for pedestrians and cyclists to obtain access to the Pakuranga Plaza area.
- (68) Cortina Place/Reeves Road Intersection: The raised features at this intersection are likely driven by the stormwater design consideration but they will result in problematic access experienced by mobility users and cyclists due to creating low points at both kerb edges. Please explore and consider design alternatives to provide better provision for active user groups.
- (69) Ti Rakau Drive/Ti Rakau Drive Off-Ramp Intersection: Please confirm your design consideration to integrate the existing shared path with Seven Oaks Drive with the cycle path features of the project.
- (70) Pakuranga Road/Reeves Road Intersection: It is identified that the road user provision at the immediate proximity of the intersection appears to be diminished including an unprotected cycle lane at the Pakuranga Road approach and unclear routes to connect southbound cyclists to the Pakuranga Road exit. Please consider optimising the cycling provision for all directions through this location
- (71) Reeves Road/Aylesbury Street Intersection: The eastern crossing path at this intersection is constrained in its accommodation of safe crossing movements for either/both pedestrians and cyclists. Please confirm if sufficient space is available to allow for the proposed infrastructure while ensuring safe movements for active road users.
- (72) Reeves Road/SEART On Ramp: It is recommended that the Applicant consider reducing the substantial median island to allocate more space to cycle lane protectors and separations between pedestrian and cyclist paths on both sides of Ti Rakau Drive, to achieve the desired safety and provision of cyclists through this area.
- (73) Marriott Road/Edgewater Drive (West) /Chevs Avenue/Ti Rakau Drive intersections: It is noted that the proposal includes a raised platform at the Edgewater Drive approach to Ti Rakau Drive, but they are not present at the Marriot Road and Chevs Avenue approaches. Please elaborate on the reasoning for this and consideration as to why this preferred traffic calming feature is not implemented at all side road approaches as a means of providing safety and convenience for active mode users in a consistent manner across the project area.
- (74) Pedestrian Jaywalking: In addition, the mid-block signalised pedestrian crossings are located centrally to bus stops on both directions. The inconvenient location will result in pedestrian jaywalking across the bus corridor, which can lead to potential safety risks and ineffective utilisation of the signalised crossings. Please discuss its design philosophy in relation to this matter, and give consideration of other potential locations/alignments for these crossings.
- (75) Wheatley Avenue/Edgewater Drive (East)/Ti Rakau Drive intersections: It is recommended that consideration be given to reallocating the road space to provide enhanced safety by way of protectors for cyclists from the carriageway by reducing the width of median islands.

- (76) Gossamer Drive/Ti Rakau Drive Intersection: The links to the central median two-way cycleway in both directions on either side of Ti Rakau Drive is provided with insufficient crossing and median widths to safely and conveniently accommodate both pedestrian and cyclist user groups. In addition, the lack of cycling provision from Gossamer Drive northwards seems to miss a large catchment of possible users. Please optimise the cycling provision and connection in the vicinity of the intersection.
- (77) Ti Rakau Bridge: It is understood that the current extent of works will end at the western side of the Ti Rakau Bridge. Please confirm how the bi-directional cycleway will be terminated safely to ensure a smooth transition to future works, especially during interim phases of the project between the completion of EB3R and EB3C/EB4.
- (78) U-turn movements: It is noted that U-turn movements and associated phasing arrangements are provided at the intersections west of Marriot Road and east of Chevis Place, respectively. Please confirm if U-turn movements at other intersections will be prohibited along the corridor to rationalise safe and efficient movements.
- (79) Construction Traffic Management Plan (CTMP): The CTMP highlights the important arrangement of temporary footpaths for pedestrians during construction works but it is not clear if a similar facility for cyclists will be provided either on-road or off-road. Please confirm if and how temporary cycling provisions will be provided for during the construction.
- (80) Road Safety Audit (RSA) Response and Decisions: It is understood that previous RSAs have been undertaken and it will be useful for these to be included in the supporting documents to assist with understanding the design rationale and decisions made on relevant matters. Therefore please provide the complete RSA document set with associated responses and agreed decisions on identified issues.

Overall, the ITA and associated documents addressing both resource consent and NOR cover a compressive range of traffic engineering and transport planning matters. The requested items aim to provide clarifications and suggestions on matters that may enhance the project benefits by addressing design considerations for future stages.

Urban Design (EB2, EB3R)

Given the scale and transformational nature of the Eastern Busway Project, we note it would be beneficial for EB2 and EB3R to be reviewed by the Auckland Urban Design Panel.

This would be particularly helpful in understanding the urban design implications associated with the land beneath the proposed RRF, as well as providing direction in association with the architectural elements of the Flyover within the wider landscape.

- (81) Should an Auckland Urban Design Panel review not be advanced, please advise on:
- the details of the methodology undertaken through AT's own internal expert review process to address such issues,
 - other reasons as to why a review by the Auckland Urban Design Panel isn't necessary, and/or
 - further detail on the "*Urban design details for works*" as set out in the Urban Design and Landscaping Plan proposed as mitigation.

Urban Design (EB2 NoR)

- (82) Please provide urban design information in the AEE on how the project, its station, streetscape and accessibility will address the future public realm / private land interface, which will be developed to substantially greater scale and intensities under the Intensification Planning Instrument (IPI) plan changes.

Reason for request: The existing built environment is only developed to a fraction of the scale and intensity of urban development that will be enabled by the IPI plan changes. This will have implications for the streetscape and street tree environment proposed as part of the project, and possibly the design of the station. There will also be substantial increases in walk-up and cycle access to the proposed station.

- (83) Please amend the Urban Design and Landscape Plan (UDLP) prescription to include a Crime Prevention Through Environmental Design (CPTED) assessment of the proposed Pakuranga Bus Station and its mitigation measures.

Reason for request: CPTED assessment and Universal Access assessment cannot be requested as part of the Outline Plan of Works, but should be included in the management plan dealing with urban design matters.

- (84) Please confirm that the Applicant considers the proposed Pakuranga Bus Station and in-road planting and street trees to be a permitted activity as 'public amenities' or 'road network activities', able to be established as part of a permitted baseline.

Reason for request: The station design and appearance and its accessibility, and the street trees and landscape planting, would have been two of the main components of the Outline Plan of Works assessment.

- (85) Please confirm the extent of the Land Requirement and Extent of Works in the northern end of William Roberts Road South, and whether footpaths will be provided in that location.

Reasons for request: As noted below, the General Arrangement Pakuranga Highway / Reeves Road Consent Plans EB 2 R 2 PL DG 100124 shows Extent of Works stopping at entrance to William Roberts Road South. However Form 18 Attachment A Designation Plans EB2 Resource Consent Footprint and Construction Land Requirement EB 234 1 RD SK Z2 00355 (and Appx 2 EB Land Requirement Plan) shows the construction footprint extending further into William Roberts Road South, and the permanent land requirement extending even further to the northwestern corner of Ti Rakau Park. Council needs to notify the accurate extent of the NoR, as it has effect from the time of lodgment. It is important to understand how the northern part of William Roberts Road South will be treated in its conversion from a carpark into a connected through street.



- (86) Please clarify why works are not proposed on the northern part of William Roberts Road South as part of this application, such as footpaths, when the resource consent associated with this Extension is transforming this 'carpark' into a connected through street and the remainder of William Roberts Road forms part of the EB2 works.

Reason for request: There is a need to understand how the whole of William Roberts Road South will function (and look) as an urban street following the completion of the William Roberts Road Extension and the EB2 works.

Urban Design (EB2 resource consent)

- (87) Please provide an indicative tree and plant species list within the application documents (noting this though is subject to later co-design) and provide in the Landscape Ecological and Arboricultural Mitigation Plans (LEAMP) an indication of the scale of the trees proposed at maturity in addition to the planting bag sizes.

Reasons for request: The LEAMP describes tree planting bag sizes, but an indication of the proposed tree size at maturity is required to determine scale effects and whether adverse visual and amenity effects will be adequately mitigated. This is particularly so as the adjacent land zonings will eventually allow for 3 to six storey buildings. Large planting bag size (180L) may only be a large sapling of a small to medium sized tree species.

Urban Design (EB3R)

- (88) Please provide urban design information in the AEE on how the project, its stations and streetscape will address the future public realm / private land interface, which will be developed to substantially greater scale and intensities under the IPI plan changes.

Reason for request: The existing residential built environment is only developed to a fraction of the scale and intensity of urban development that will be enabled by the IPI plan changes. This will have implications for the streetscape and street tree environment proposed as part of the project, and possibly the design of the stations and their accessibility. There will also be substantial increases in walk-up and cycle access to the proposed stations, which appear to be relying on at-grade pedestrian access across two or four lanes of traffic. Residential intensification of the northeastern side of Ti Rakau Drive is also likely to involve removal of many of the private trees that currently provide amenity to that side of the road.

- (89) Please provide information on the ecological re-planting of the (coastal) wetland and its margins and the stream riparian margins, to include larger specimens further from the water's edge.

Reason for request: The ecological re-planting is mitigation within the resource consents for vegetation clearance and works within and near the wetland and streams. However it will also provide public open space amenity as well as ecological services.

- (90) Please confirm that the Applicant considers the proposed Edgewater and Gossamer intermediate stations and in-road planting and street trees to be a permitted activity as 'public amenities' or 'road network activities', able to be established as part of a permitted baseline.

Reason for request: The stations' design, appearance and their accessibility, and the street trees and landscape planting, would have been two of the main components of the Outline Plan of Works assessment if EB3R had a Notice of Requirement. If resource consents are required for their establishment (for example street tree and landscape planting mitigation for vegetation removal) their effects will be assessed.

- (91) Please confirm there are no new street trees proposed along the northeastern side of Ti Rakau Drive, even though some existing street trees will be removed to create pedestrian and cycle facilities.

Reason for request: Arborlab plans in the Appx 16 Arborist assessment show mainly street trees to be removed from the northeastern side of Ti Rakau Drive, with many of the trees to be retained being sited on private property, and vulnerable to be removed for residential intensification.

- (92) Please provide an indicative tree and plant species list within the application documents (even though subject to later co-design) and provide in the LEAMP an indication of the scale of the trees proposed at maturity in addition to the planting bag sizes.

Reasons for request: The LEAMP describes tree planting bag sizes, but an indication of the proposed tree size at maturity is required to determine scale effects and whether adverse visual and amenity effects will be adequately mitigated. This is particularly so as the adjacent land zonings will eventually allow for 3 to six storey buildings. Large planting bag size (180L) may only be a large sapling of a small to medium sized tree species.

Earthworks and Streamworks (EB2 and EB3R resource consents)

- (93) Please provide a drawing showing the overall earthworks for each, EB2R and EB3R areas, that are subject to the E26 infringements and National Environmental Standards for Freshwater (NES-F) Regulations, and include with the extent of the 100m setback from all natural wetlands. Please include the location of the access ways to the works areas (e.g. to outfall construction).
- (94) It is acknowledged that cut and fill plans have been provided for the central line through the road alignments, and that the retaining wall locations have been provided. However it is unclear what cut / fill will be required across the site to construct the road alignment and any batters that will be formed at the road edges. Please provide a cut / fill plan view that estimates, and locates, the cut and fill requirements across the entire project's alignment.
- (95) As a general observation, the reference / labels used for the stormwater outfalls vary across the documents (e.g. AEE, ecological assessment reports, Erosion & Sediment Control Plan (ESCP) Report, drawings). For ease of reference, please provide a table that identifies the location of each outfall (e.g. a screenshot of the aerial image and address) and the reference relative to each document.
- (96) For the purposes of clarity, please use a consistent naming reference for each new outfall, e.g. the proposed outfall near Riverhills Park as part of EB3R is described as "New outfall adjacent MCC_108746", while the two new outfalls associated with EB2 are described as "Outfall 06-05" and "Outfall 89-18".

Earthworks and Streamworks (EB2 resource consent)

NES-F Regulations:

Council's Specialist – Earth, Streams and Trees has identified additional reasons for consent in association with the NES-F relating to Earthworks and Diversion / Discharge of water during earthworks and Diversion / Discharge, please refer to the attached document (Attachment One) for further details.

- (97) In light of the above, please review and revise the NES-F triggers / reasons for consent as identified in section 7.3.3.
- (98) Please amend the assessment of effects to ensure it assesses all reasons for consent.

Council's Specialist – Earth, Streams and Trees has identified that the entire CMA is considered natural

wetland, with further implications set out in the above-mentioned document.

(99) Please amend the application documents to identify and quantify all works proposed within, with 10m, and/or within 100m, of a natural wetland (including drawings).

(100) Please revise the assessment of effects, as necessary.

Works within the bed of a Watercourse: AUP:OP and NES-F Regulations (section 7.3.3 of the AEE; Ecology Assessment; EB2 Drawings):

In the above document, Council's Specialist – Earth, Streams and Trees has noted that it is currently unclear whether consent under E3 would be required for the works associated with stormwater outfall and 'vegetated riprap' as shown on the ESCP drawing SK-000013.

(101) Further information is required to determine any additional reasons for consent under Chapter E3 (and NES-F where applicable) for the EB2R works:

- a. Please locate the stream extent on the drawings to clarify whether works and/or structures will be located within the bed of a stream.
- b. Please provide the dimensions of the proposed structures located within the bed of the stream on the relevant drawings.
- c. Please confirm the total length of stream works proposed, as applicable.
- d. Please assess the proposed structures and works against the rules of chapter E3 of the AUP:OP and the regulations of the NES-F. Please either:
 - clarify how the structures / works will meet the permitted activity criteria; and/or
 - provide an assessment of effects where consent is triggered.

In each case, please clarify that the structure has been designed to occupy the minimum length / area of stream bed as possible.

(102) The Marine Ecological Assessment document includes Table 1 that summarises the location of outfalls and what works are proposed. For outfall '12' (MCC-108680) it notes "Potential modification/connection to outfall". Please confirm whether this outfall will be upgraded. If yes, please update the drawings (including the ESCP) and provide details as requested for outfall 13/14 (MCC_108699) above, should works be located within the bed of a stream (including any reach upstream of the CMA).

Erosion and Sediment Control:

(103) It is understood that trenching, including the 'Deep Trenches,' are proposed to be undertaken within the thresholds of the permitted activity criteria (e.g. maximum of 120m). For the avoidance of doubt, please update the cut and cover operations annotations on the ESC drawings relating to 'Deep Trenches' to state this threshold.

Regarding construction of the proposed outfalls and vegetated ripraps (including those not associated with a stream); and the new 'naturalised watercourse, it is considered that a silt fence is likely not to be the best option for the management of sediment-laden runoff from the works area.

(104) In light of the above, please review the proposed sediment controls as shown on the ESC plan.

(105) Please identify on the ESC drawings the proposed construction access way to the outfall construction areas. Please ensure this is included within the total earthworks areas (or stream

works), as applicable.

Earthworks and Streamworks (EB3R resource consent)

NES-F Regulations:

Council's Specialist – Earth, Streams and Trees has identified additional reasons for consent in association with the NES-F relating to Earthworks and Diversion / Discharge of water during earthworks and Diversion / Discharge, please refer to the attached document (Attachment Two) for further details.

(106) In light of above, please review and revise the NES-F triggers / reasons for consent as identified in section 5.3.3.

(107) Please amend the assessment of effects to ensure it assesses all reasons for consent.

Works within the bed of a Watercourse: AUP:OP and NES-F Regulations (section 5.3.3 of the AEE; Ecology Assessment; EB3R Drawings):

It is currently unclear whether consent under E3 would be required for the works associated with stormwater outfall and 'vegetated riprap' as shown on the ESCP drawings SK-000011 and SK-000012, which are located adjacent to or within 'streams 3a and 3b' as shown on figure 5-11 of the ecological effects assessment.

The drawings do not currently identify where the stormwater outfall construction is located in relation to the stream bed, or provide the dimensions of the structures.

(108) Further information is required to determine any additional reasons for consent under E3 (and NES-F where applicable) for the EB3R works:

- a. Please locate the stream extent on the drawings to clarify whether works and/or structures will be located within the bed of a stream.
- b. Please provide the dimensions of the proposed structures located within the bed of the stream on the relevant drawings. (Dimensions of the existing structures would be helpful as a comparison to the proposed structures).
- c. Please confirm the total length of stream works proposed, as applicable.
- d. Please assess the proposed structures and works against the rules of chapter E3 of the AUP:OP and (regulations of the NES-F where applicable). Please either:
 - clarify how the structures / works will meet the permitted activity criteria; and/or
 - provide an assessment of effects where consent is triggered.

In each case, please clarify that the structure has been designed to occupy the minimum length / area of stream bed as possible.

Erosion and Sediment Control:

Regarding construction of the proposed outfalls and vegetated ripraps (including those not associated with a stream); and the new 'naturalised watercourse / swale' at Riverhills Park, it is considered that a silt fence is likely not to be the best option for the management of sediment-laden runoff from the works area.

(109) In light of the above, please review the proposed sediment controls as shown on the ESC plan.

(110) Please identify on the ESC drawings the proposed construction access way to the outfall construction areas. Please ensure this is included within the total earthworks areas (or stream works), as applicable.

Works are proposed to be undertaken within Riverhills Park. The construction of the 'naturalised watercourse / swale' has been identified on the drawings and discussed in the ESCP. However, additional changes in the configuration of the Riverhills Park facilities are also proposed.

(111) To understand the potential effects of these works:

- a) Please clarify whether any of these changes will require earthworks, and clarify the total area of works proposed.
- b) Please identify whether any additional reasons for consent will be triggered as a result of these works (e.g. under the AUP:OP or the NES-F). Where works are proposed to be undertaken as a permitted activity, please demonstrate how works will be managed to achieve permitted activity criteria (e.g. please provide the ESCP for these works).

(112) ESCP Drawing SK-000014 identifies a stormwater line directed to the south of the drawing. For avoidance of doubt, please clarify whether this stormwater line(s) and/or outfall will be upgraded as part of the proposed development. Please update the drawings and provide details where necessary.

You must provide this information within 15 working days (by Friday 30 September 2022). If you are unable to provide the information by this date, then please contact us so that an alternative timeframe can be mutually agreed.

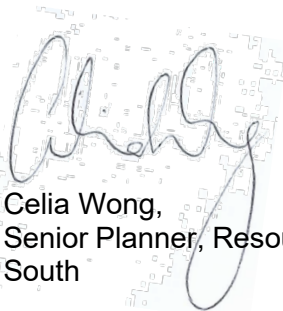
Note: If you will require more than 15 working days to provide this further information, Council will seek that you agree to an extension of time under section 37 of the RMA). This will enable appropriate time for planner and specialists to undertake the necessary review of the information once provided.

If you do not respond within 15 working days, refuse to provide the information or do not meet an agreed alternative timeframe between the council and yourself, this application must be publicly notified as required by section 95C of the RMA.


In accordance with the RMA, processing of your NOR and resource consents will remain on-hold until the indicated date, pending your response to this request. Please note that the processing clock will stop as this is the first request for additional information.

If you have any queries regarding the above, please contact Celia Wong (for resource consent matters) on 021 398 064 celia.wong@aucklandcouncil.govt.nz or David Wren (for NOR matters) on 021 276 5786 david@davidwren.co.nz.

Yours sincerely,



Celia Wong,
Senior Planner, Resource Consents
South



David Wren,
Consultant

EB2R – S92 Request

Documents Reviewed:

- Document titled “Eastern Busway 2 Assessment of Effects on the Environment”, Rev 3, dated 11/08/22
- EB2 Drawings, including EB2 ESC Plans
- Document titled “Eastern Busway EB2 and EB3 Residential Terrestrial and Freshwater Ecological Effects Assessment” Rev 1, dated 18/07/22
- Document titled “Eastern Busway EB2 and EB3 Residential Construction Methodology Overview”, Rev A, dated 18/07/22
- Document titled “Eastern Busway – EB2 / EB3 Erosion and Sediment Control Plan” Rev 1, dated 25/07/22
- Document titled “Eastern Busway EB2 and EB3 Residential Erosion and Sediment Control Effects Assessment” Rev 1, dated 18/07/22

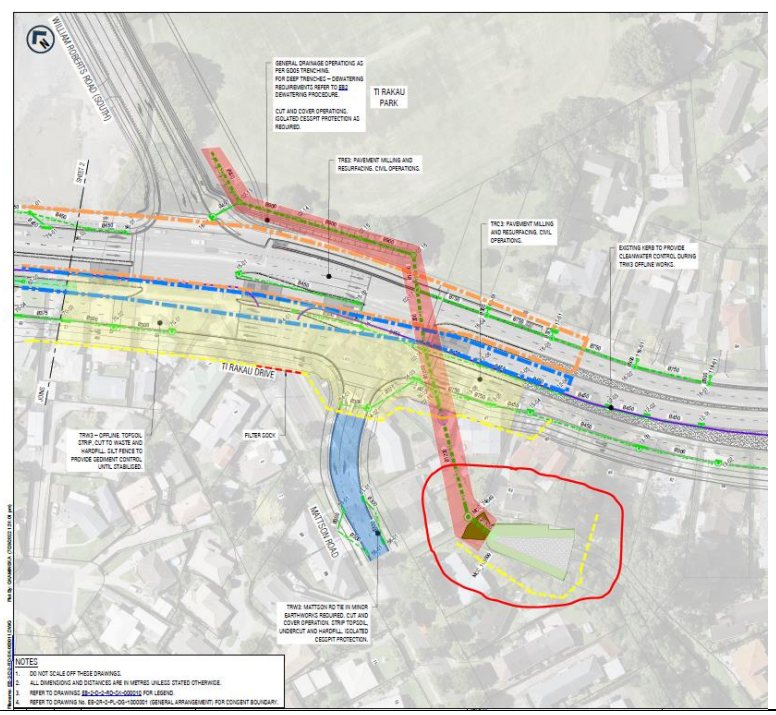
NES-F Regulations (section 7.3.3 of the AEE):

1	<p>Section 7.3.3 of the AEE outlines the NES-F Regulations. However, not all regulations appear to have been identified.</p> <p>Earthworks and Diversion / Discharge of water during earthworks:</p> <ul style="list-style-type: none">• Consent is required for the diversion and discharge of treated sediment-laden water during earthworks / land disturbance within 100m of the natural wetlands. This activity would be included under Reg 45(4), and is additional to the stormwater diversion and discharge. This is not currently included in section 7.3.3 of the AEE, and so should be included as an additional ‘comment’ when specifying the reason for triggering this Regulation. <p>Diversion / Discharge:</p> <ul style="list-style-type: none">• The applicant is constructing two <u>new</u> outfalls, and therefore would fall under the “construction” of specified infrastructure as opposed to maintenance of. Therefore, consent is also required under Reg 45(4).• With that said, Regulation 47(3) may still be relevant for any works associated with existing infrastructure within 100m of the natural wetlands – the applicant’s team to review and amend the ‘comment’ section for Reg 47(3) discussion. <p>a) In light of above, please review and revise the NES-F triggers / reasons for consent as identified in section 7.3.3. b) Please amend the assessment of effects to ensure it assesses all reasons for consent.</p>
2	<p>Natural Wetlands and CMA:</p> <ul style="list-style-type: none">• The entire CMA is considered natural wetland. Please see Practice Guidance Note RC 3.3.21(V3) – Managing Natural Wetlands under the National Environmental Standards for Freshwater Regulations 2020 – available at Resource Consenting Practice & Guidance Notes - Auckland Design Manual. In particular, please see Page 3 of 22.• The implications for this will likely be:

	<ul style="list-style-type: none"> • changing the total area of earthworks, vegetation removal, and impervious area relating to stormwater discharges, that will be undertaken within 10m and 100m of the natural wetlands; • updating the reasons for consents, including the 'comments', and • potentially amending the assessment of effects. <p>a) Please amend the application documents to identify and quantify all works proposed within, within 10m, and/or within 100m, of a natural wetland (including drawings).</p> <p>b) Please revise the assessment of effects, as necessary.</p>
<p><u>Works within the bed of a Watercourse: AUP:OP and NES-F Regulations (section 7.3.3 of the AEE; Ecology Assessment; EB2R Drawings):</u></p>	
<p>3</p>	<p>It is currently unclear whether consent under E3 would be required for the works associated with stormwater outfall and 'vegetated riprap' as shown on the ESCP drawing SK-000013. This outfall appears to be located within 'stream 2' as shown on figure 5-11 of the ecological effects assessment (outfall 13/14; MCC_108699). However, neither the ESCP, nor the stormwater plan equivalent, appears to clarify where the stormwater outfall construction is location in relation to the streambed, or provide the dimensions of the structures. Furthermore, it is unclear what the dimensions of the existing structures are, in comparison to the proposed structures. The ecological effects assessment suggests that these works are a permitted activity, however, no further details are provided.</p> <p>Further information is required to determine any additional reasons for consent under E3 (and NES-F where applicable) for the EB2R works:</p> <p>a) Please locate the stream extent on the drawings to clarify whether works and/or structures will be located within the bed of a stream.</p> <p>b) Please provide the dimensions of the proposed structures located within the bed of the stream on the relevant drawings.</p> <p>c) Please confirm the total length of stream works proposed, as applicable.</p> <p>d) Please assess the proposed structures and works against the rules of chapter E3 of the AUP:OP and the regulations of the NES-F. Please either:</p> <ul style="list-style-type: none"> • clarify how the structures / works will meet the permitted activity criteria; and/or • provide an assessment of effects where consent is triggered. <p>In each case, please clarify that the structure has been designed to occupy the minimum length / area of stream bed as possible.</p>



Figure 5-11 Stream 2, Stream 3a and Stream 3b discharging into the Tāmaki Estuary at EB3R extent



3b	<p>The Marine Ecological Assessment document provides Table 1 that summarises the location of outfalls and what works are proposed. For outfall '12' (MCC-108680) it notes "<i>Potential modification/connection to outfall</i>". Please confirm whether this outfall will be upgraded. If yes, please update the drawings (including the ESCP) and provide details as requested for outfall 13/14 (MCC_108699) above, should works be located within the bed of a stream (including any reach upstream of the CMA).</p>
<p>Proposed Erosion and Sediment Controls</p>	
4	<p>It is understood that trenching, including the 'Deep Trenches' are proposed to be undertaken within the thresholds of the permitted activity criteria (e.g. maximum of 120m). For the avoidance of doubt, please update the cut and cover operations annotations on the ESC drawings relating to 'Deep Trenches' to state this threshold.</p>
5	<p>Regarding the proposed outfall and vegetated riprap construction at MCC_108699 (drawing EB-2-D-2-RD-SK-000013 Rev A):</p> <ol style="list-style-type: none"> a) A silt Fence is proposed to manage runoff from this area. If crossing a concentrated flow path and/or stream channel, a Silt Fence is likely not to be the best option for management of sediment-laden runoff from the works area. Please review the proposed sediment controls as shown on the ESC plan.

	b) Please identify on the ESC drawings the proposed construction access way to the outfall construction area. Please ensure this is included within the total earthworks areas, as applicable.
6	Question as per email chain with you: Please provide a drawing showing the overall earthworks for each , the EB2R and EB3R areas, that are subject to the E26 infringements and NES-FW Regulations, and include with the extent of the 100m setback from all natural wetlands also shown . Please include the location of the access ways to the works areas (e.g. to outfall construction).
7	It is acknowledged that cut and fill plans have been provided for the central line through the road alignments, and that the retaining wall locations have been provided. However, it is unclear what cut / fill will be required across the site to construct the road alignment and any batters that will be formed at the road edges. Please provide a cut / fill plan view that estimates, and locates, the cut and fill requirements across the entire project alignment.
8	Question as per email chain with you: As a general observation, the reference / labels used for the stormwater outfalls vary across the documents (e.g. AEE, ecological assessment reports, ESCP Report, drawings). For ease of reference, please provide a table that identifies the location of each outfall (e.g. a screenshot of the aerial image and address) and the reference relative to each document.

EB3R – S92 Request

Documents Reviewed:

- Document titled “Eastern Busway 2 Assessment of Effects on the Environment”, Rev 3, dated 11/08/22
- EB3 Drawings, including EB3 ESC Plans
- Document titled “Eastern Busway EB2 and EB3 Residential Terrestrial and Freshwater Ecological Effects Assessment” Rev 1, dated 18/07/22
- Document titled “Eastern Busway EB2 and EB3 Residential Construction Methodology Overview”, Rev A, dated 18/07/22
- Document titled “Eastern Busway – EB2 / EB3 Erosion and Sediment Control Plan” Rev 1, dated 25/07/22
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Earthworks and NES-F Regulations (section 5.3.3 of the AEE):

1	<p>Section 5.3.3 of the AEE outlines the NES-F Regulations. However, not all regulations appear to have been identified.</p> <p>Earthworks and Diversion / Discharge of water during earthworks:</p> <ul style="list-style-type: none">• Consent is required for the diversion and discharge of treated sediment-laden water during earthworks / land disturbance within 100m of the natural wetlands. This activity would be included under Reg 45(4), and is additional to the stormwater diversion and discharge. This is not currently included in section 5.3.3 of the AEE, and so should be included as an additional ‘comment’ when specifying the reason for triggering this Regulation. <p>Diversion / Discharge:</p> <ul style="list-style-type: none">• <u>New</u> outfalls are proposed, and therefore would fall under the “construction” of specified infrastructure as opposed to maintenance of. Therefore, consent is also required under Reg 45(4).• With that said, Regulation 47(3) may still be relevant for any works associated with existing infrastructure within 100m of the natural wetlands – the applicant’s team to review and amend the ‘comment’ section for Reg 47(3) discussion. <p>a) In light of above, please review and revise the NES-F triggers / reasons for consent as identified in section 7.3.3. b) Please amend the assessment of effects to ensure it assesses all reasons for consent.</p>
2	<p>Earthworks and Natural Wetlands and CMA:</p> <p>Please provide a drawing showing the overall earthworks for the EB3R areas, that are subject to the E26 infringements and NES-FW Regulations, and include the extent of the 100m setback from all natural wetlands. Please include the location of the access ways to the works areas (e.g. to outfall construction).</p>

Works within the bed of a Watercourse: AUP:OP and NES-F Regulations (sections 5.2.3 and 5.3.3 of the AEE; Ecology Assessment; EB3R Drawings):

3

It is currently unclear whether consent under E3 would be required for the works associated with stormwater outfalls and 'vegetated riprap' as shown on the ESCP drawings SK-000011 and SK-000012, SK-000012, which are located adjacent to or within 'streams 3a and 3b' as shown on figure 5-11 of the ecological effects assessment. The AEE and ecological effects assessment suggests that these works are a permitted activity, however, no further details are provided. The drawings do not currently identify where the stormwater outfall construction is location in relation to the stream bed, or provide the dimensions of the structures.

Furthermore, following the site visit, it is unclear whether the proposed extension of infrastructure and stormwater outfalls shown on the ESCP drawings SK-000013 and SK-000014 are associated with a stream reach, or directed to land above the CMA.

Further information is required to determine any additional reasons for consent under E3 (and NES-F where applicable) for the EB3R works:

- a) For the avoidance of doubt, please provide an ecological assessment for all stormwater outfall locations that are not currently included in the existing ecological assessment to clarify whether any additional streams are present.
- b) Please locate the stream extent on the drawings to clarify whether works and/or structures will be located within the bed of a stream.
- c) Please provide the dimensions of the proposed structures located within the bed of the stream on the relevant drawings. (Dimensions of the existing structures would be helpful as a comparison to the proposed structures).
- d) Please confirm the total length of stream works proposed, as applicable.
- e) Please assess the proposed structures and works against the rules of chapter E3 of the AUP:OP and (regulations of the NES-F where applicable). Please either:
 - clarify how the structures / works will meet the permitted activity criteria; and/or
 - provide an assessment of effects where consent is triggered.

In each case, please clarify that the structure has been designed to occupy the minimum length / area of stream bed as possible.

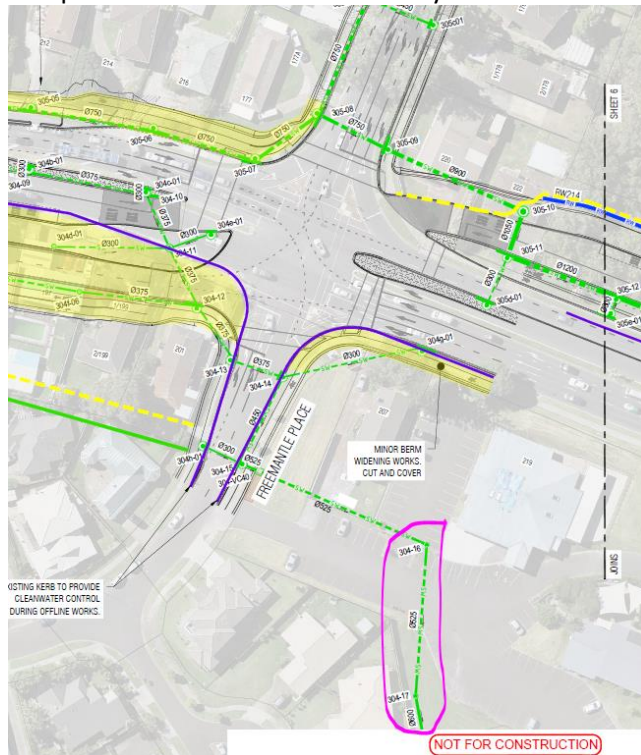


Proposed Erosion and Sediment Controls

4	<p>Regarding construction of the proposed outfalls and vegetated ripraps (including those not associated with a stream); and the new ‘naturalised watercourse / swale’ at Riverhills Park:</p> <ul style="list-style-type: none"> a) A silt Fence is proposed to manage runoff from these areas. If crossing a concentrated flow path and/or stream channel, a Silt Fence is likely not to be the best option for management of sediment-laden runoff from the works area. During the site visit, it was observed that a number of these locations were inundated with water. Please review the proposed sediment controls as shown on the ESC plan. b) Please identify on the ESC drawings the proposed construction access way to the outfall construction areas. Please ensure this is included within the total earthworks areas (or stream works), as applicable.
5	<p>Works are proposed to be undertaken within Riverhills Park. The construction of the ‘naturalised watercourse / swale’ has been identified on the drawings and discussed in the ESCP. However, additional changes in the configuration of the Riverhills Park facilities are also proposed.</p> <ul style="list-style-type: none"> a) Please clarify whether any of these changes will require earthworks, and clarify the total area of works proposed. b) Please identify whether any additional reasons for consent will be triggered as a result of these works (e.g. under the AUP:OP or the NES-F). Where works are proposed to be undertaken as a permitted activity, please demonstrate how works will be managed to achieve permitted activity criteria (e.g. please provide the ESCP for these works).

6 It is acknowledged that cut and fill plans have been provided for the MC10 line through the centre of the alignment, and that the retaining wall locations have been provided. However, it is unclear what cut / fill will be required across the site to construct the road alignment and batters that will be formed at the road edges. Please provide a cut / fill plan view that estimates, and locates, the cut and fill requirements across the entire project alignment.

7 ESCP Drawing SK-000014 identifies a stormwater line directed to the south of the drawing (outlined in pink below). For avoidance of doubt, please clarify whether this stormwater line(s) and/or outfall will be upgraded as part of the proposed development. Please update the drawings and provide details where necessary.



Eastern Busway	Drawing Status FOR LODGEMENT	Design Package CIVIL AND GEOMETRICS
	Project Name 14200 0300 MOUNT SEEN CIRCUIT	Drawing Title TI RAKAU DRIVE EROSION CONTROL PLAN SHEET 5 OF 6
2016 NEW ZEALAND A1 1:500 A3 1:1000	Drawing Number EB-2-D-3-RD-SK-000014	Format A

8	As a general observation, the reference / labels used for the stormwater outfalls vary across the documents (e.g. AEE, ecological assessment reports, ESCP Report, drawings). For ease of reference, please provide a table that identifies the location of each outfall (e.g. a screenshot of the aerial image and address) and the reference relative to each document.
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