



Land South of Floran Farm

Existing Drainage Infrastructure Clarification Note

Planning Application: DM/26/0843

Job Number: 1735

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1. Introduction

1.1 Flume Consulting Engineers Ltd has prepared this Drainage Clarification Note in support of planning application DM/26/0843 for the proposed development of nine dwellings on land south of Floran Farm, Hophurst Hill, Crawley Down.

1.2 A Surface and Foul Water Drainage Strategy has previously been submitted in support of the application. The strategy proposes attenuation of surface water runoff within the site prior to restricted discharge to the existing private drainage system serving the wider Floran Farm holding. Foul drainage is proposed to be treated by a package treatment plant prior to discharge via the same established downstream drainage route.

1.3 Following review of the submitted information, Mid Sussex District Council's Flood Risk and Drainage Team confirmed that the drainage strategy demonstrates a potential drainage solution in principle, including attenuation of surface water runoff to the QBAR greenfield runoff rate. The outstanding matter related to evidence of the existing downstream drainage route and its connection to the receiving watercourse.

1.4 Following further clarification, the Council confirmed on 21st July 2026 that the following information should be provided:

- a plan showing the existing private drainage network associated with the wider Floran Farm downstream discharge route
- a plan and photographic evidence identifying the existing outfall from the private drainage network into the receiving watercourse
- a plan demonstrating that the receiving watercourse has onward connectivity downstream of the outfall

1.5 The Council confirmed that this information should be proportionate to the outline planning stage and sufficient to demonstrate that there is a feasible drainage route and that the proposed restricted discharges can be accommodated in principle.

1.6 This note, the accompanying Drawing SK 1000, Appendix A – Photographic Evidence of Existing Drainage Infrastructure and Appendix B – LiDAR Terrain and Downstream Connectivity Evidence have therefore been prepared specifically to address those outstanding matters.

2. Existing Drainage Arrangement

2.1 The wider Floran Farm holding is served by a long-established private drainage system comprising below-ground drainage infrastructure, chambers, piped and culverted sections and open drainage ditches.

2.2 The drainage system serves the existing farm and associated land and ultimately connects with the existing ordinary watercourse system downstream of the application site.

2.3 The existing drainage arrangement has been established from information provided by the landowner, site photographs, available mapping, aerial imagery and topographic and LiDAR terrain information. These complementary sources provide a consistent picture of the downstream drainage arrangement and are presented on Drawing SK 1000.

2.4 The existing private drainage route extends from the Floran Farm holding towards the existing open ditch/watercourse system identified on the accompanying drawing. Photographic evidence records the existing drainage infrastructure along this route, including drainage chambers, piped and culverted sections and established open drainage features.

2.5 The route shown on Drawing SK 1000 therefore represents the existing drainage arrangement serving the wider Floran Farm holding and provides an established downstream drainage route from the proposed development to the receiving watercourse system.

3. Existing Outfall and Receiving Watercourse

3.1 The existing private drainage system discharges to the established open ditch/watercourse system shown on Drawing SK 1000.

3.2 The receiving feature forms part of the existing ordinary watercourse network serving the Floran Farm holding and surrounding land. It is an established drainage feature rather than a purpose-built drainage feature associated with the proposed development.

3.3 The accompanying drawing identifies the private drainage route, its connection with the receiving watercourse and the subsequent downstream watercourse route. The photographic evidence contained within Appendix A records the physical drainage infrastructure and open drainage features forming this system.

3.4 Available terrain information provides further evidence of the drainage relationship. The application site is situated at approximately 107.5mAOD, with the terrain falling progressively along the identified downstream drainage corridor to approximately 91.5mAOD towards its connection with Felbridge Water.

3.5 The physical drainage features, landowner information and terrain evidence are therefore mutually consistent and demonstrate an established gravity drainage route between the Floran Farm holding and the receiving ordinary watercourse.

4. Downstream Connectivity

4.1 The Council has specifically requested evidence that the receiving watercourse has onward connectivity downstream of the existing outfall.

4.2 Drawing SK 1000 shows the receiving ordinary watercourse continuing downstream from the existing drainage connection towards Felbridge Water.

4.3 LiDAR terrain information identifies the watercourse as a defined and continuous topographic drainage feature. The terrain continues to fall along the drainage corridor towards Felbridge Water and demonstrates that the receiving watercourse forms part of a wider downstream drainage system rather than terminating as an isolated or enclosed feature.

4.4 This is consistent with the available mapping, aerial imagery, photographic evidence and information provided by the landowner regarding the operation of the existing drainage system.

4.5 The submitted evidence therefore demonstrates a continuous downstream drainage route from the Floran Farm holding through the receiving ordinary watercourse and onwards towards Felbridge Water.

5. Proposed Surface Water Drainage

5.1 The surface water drainage principles established within the previously submitted Drainage Strategy remain unchanged.

5.2 Surface water runoff from the proposed development will be collected and attenuated within the site prior to controlled discharge to the existing private drainage system.

5.3 The drainage strategy provides approximately 55m³ of attenuation storage, with the discharge restricted to the calculated QBAR greenfield runoff rate of 2.9 l/s.

5.4 The application site presently contains a substantial area of hardstanding. Restriction of the proposed development discharge to the greenfield runoff rate therefore provides a material reduction in peak surface water discharge relative to the existing unrestricted drainage condition.

5.5 The proposed development will consequently make controlled use of an established drainage route already serving the wider Floran Farm holding. The development does not depend upon the creation of a new or unidentified downstream drainage destination.

5.6 The additional route, outfall and watercourse information provided with this note therefore demonstrates that the restricted surface water discharge has an established and continuous downstream route to the receiving watercourse system.

6. Proposed Foul Drainage

6.1 There is no available public foul sewer serving the proposed development. Foul drainage is therefore proposed to be treated within a Klargestar BioTec+9 package treatment plant, as established within the submitted Drainage Strategy.

6.2 The design occupancy of 33 persons results in a calculated maximum treated effluent discharge of approximately 4.95m³/day.

6.3 Following treatment, effluent will discharge via the identified private drainage route to the receiving ordinary watercourse.

6.4 The proposed system therefore provides treatment of domestic foul flows prior to discharge and has an identified downstream route to a receiving watercourse.

6.5 The regulatory requirements governing the subsequent discharge of treated effluent are separate from the establishment of a viable drainage strategy for planning purposes. Small sewage treatment plant discharges to surface water may operate under the Environment Agency's General Binding Rules where the applicable criteria are satisfied. Where those criteria cannot be satisfied, the discharge is subject to environmental permitting by the Environment Agency.

6.6 Accordingly, the applicability of the General Binding Rules or any requirement for an environmental permit does not alter the physical drainage principle demonstrated by this submission. The proposed development has an identified treatment method, an established downstream drainage route and an identified receiving watercourse. Any environmental permit required for operation of the treated effluent discharge would be obtained separately through the Environment Agency.

7. Response to the Council's Outstanding Matters

7.1 The information submitted with this note directly addresses the three matters identified by the Flood Risk and Drainage Team on 21st July 2026.

Existing private drainage network

7.2 Drawing SK 1000 identifies the existing private drainage system serving the wider Floran Farm holding and its downstream route to the receiving ordinary watercourse. The route is supported by landowner information, photographic evidence, mapping and terrain information.

Existing outfall

7.3 The drawing identifies the connection between the existing private drainage system and the receiving ordinary watercourse. Appendix A provides photographic evidence of the existing drainage infrastructure and associated open drainage features forming the downstream system.

Onward connectivity

7.4 The receiving watercourse is shown continuing downstream towards Felbridge Water. Available mapping, aerial imagery and LiDAR terrain information demonstrate a defined and continuous downstream drainage corridor.

7.5 The evidence therefore demonstrates an established and feasible drainage route from the Floran Farm holding to the receiving ordinary watercourse and onward towards Felbridge Water.

8. Conclusion

8.1 The previously submitted Drainage Strategy established the proposed surface and foul drainage principles for the development. The Council subsequently confirmed that the strategy demonstrates a potential drainage solution in principle, subject to further evidence of the existing downstream drainage route, outfall and receiving watercourse connectivity.

8.2 The additional information now submitted identifies:

- the existing private drainage system and downstream route serving the wider Floran Farm holding
- the connection to the existing receiving ordinary watercourse
- physical drainage infrastructure and open drainage features recorded by photographic evidence
- the continued downstream watercourse route towards Felbridge Water

8.3 The identified drainage arrangement is supported by landowner information, photographic evidence, available mapping, aerial imagery and LiDAR terrain data. The terrain information demonstrates the substantial fall from the application site at approximately 107.5mAOD towards the receiving drainage corridor at approximately 91.5mAOD, together with continued downstream connectivity towards Felbridge Water.

8.4 Surface water from the development will be attenuated and restricted to 2.9 l/s, materially limiting the rate of discharge from the development to the established downstream drainage system.

8.5 Foul flows will be treated within a package treatment plant prior to discharge at approximately 4.95m³/day. Any environmental permitting requirements associated with operation of that treated effluent discharge fall within the separate Environment Agency regime and do not alter the existence or feasibility of the identified drainage route.

8.6 The information now provided therefore demonstrates an established and viable means of drainage in principle, including the existing downstream drainage route, connection to the receiving ordinary watercourse and onward watercourse connectivity specifically requested by the Flood Risk and Drainage Team.

8.7 The specific outstanding drainage information identified by the Council on 21st July 2026 has therefore been provided at the proportionate level requested for the outline planning application.

Note:

This report has been prepared for submission to the Local Planning Authority to clarify the existing drainage infrastructure and downstream connectivity associated with the proposed development. It is based on the information available at the time of preparation and should not be relied upon for any other purpose without our written agreement. Copyright remains with Flume Consulting Engineers Ltd.

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Date	8 September 2026	8 September 2026	8 September 2026

Appendix A - Photographic Evidence of Existing Drainage Infrastructure

APPENDIX A - PHOTOGRAPHIC EVIDENCE OF EXISTING DRAINAGE INFRASTRUCTURE

Land South of Floran Farm, Hophurst Hill, Crawley Down
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The photographs below were provided by the landowner and record the existing drainage infrastructure and downstream drainage corridor serving the wider Floran Farm holding. The approximate locations of Photographs A1 to A6 are shown on Drawing SK1000. Taken together, the photographs record the existing private drainage infrastructure along the downstream route and its relationship with the receiving ordinary watercourse.



Photo A1
Upstream end of existing private drainage route / drainage infrastructure serving Floran Farm.

Existing grated drainage inlet within the developed Floran Farm area. This provides photographic evidence of established drainage infrastructure serving the wider holding at the upstream end of the route shown on Drawing SK1000.



Photo A2
Existing piped drainage route at upstream end of the downstream corridor.

View within an existing drainage chamber showing connected pipework. This records the physical below-ground drainage infrastructure forming part of the existing private drainage route.



Photo A3
Downstream drainage infrastructure approaching the receiving watercourse.

Existing large-diameter culverted drainage section close to the downstream end of the private drainage route. The photograph provides clear physical evidence of the established conveyance infrastructure approaching the receiving ordinary watercourse.



Photo A4
Existing private drainage infrastructure along downstream route.

Existing large-diameter twinwall pipework within the downstream drainage corridor. This provides further evidence of the established private drainage infrastructure along the route identified on Drawing SK1000.



Photo A5
Existing private drainage route through the defined drainage corridor.

Established linear open drainage feature within the defined downstream corridor. The feature is consistent with the route shown on Drawing SK1000 and the pronounced topographic drainage corridor identified by the LiDAR terrain data.

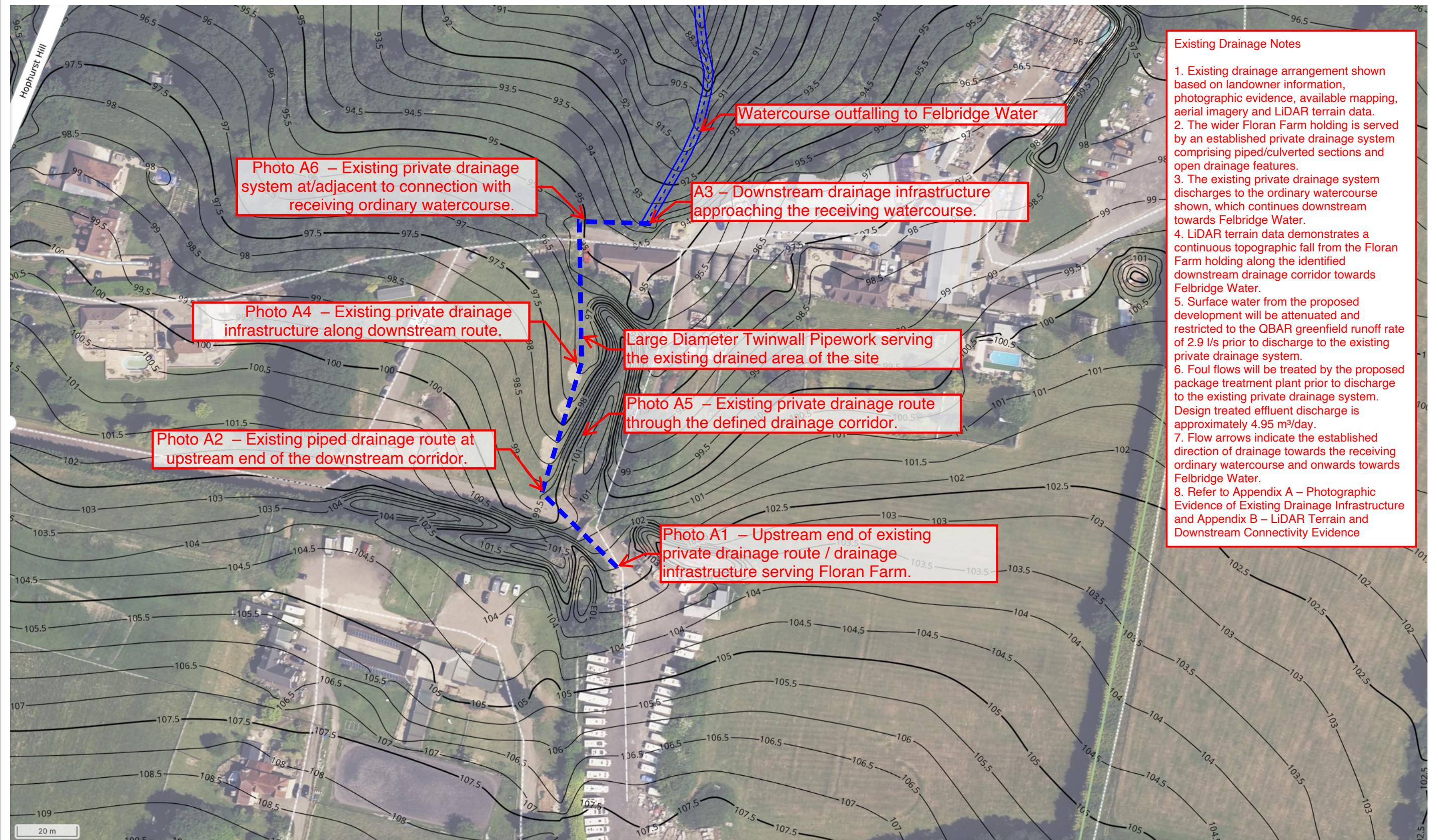


Photo A6
Existing private drainage system
at/adjacent to connection with receiving
ordinary watercourse.

Established open drainage feature at the downstream end of the private drainage system, adjacent to its connection with the receiving ordinary watercourse. This photograph supports the identified transition from the private drainage route to the downstream open watercourse system.

Photographic record: The photographs provide a continuous supporting record of the established drainage arrangement shown on Drawing SK1000, including upstream drainage infrastructure, piped and culverted sections, the defined downstream drainage corridor and the connection with the receiving ordinary watercourse. They should be read alongside Drawing SK1000 and Appendix B - LiDAR Terrain and Downstream Connectivity Evidence.

Appendix B - LiDAR Terrain and Downstream Connectivity Evidence



Existing Drainage Notes

1. Existing drainage arrangement shown based on landowner information, photographic evidence, available mapping, aerial imagery and LiDAR terrain data.
2. The wider Floran Farm holding is served by an established private drainage system comprising piped/culverted sections and open drainage features.
3. The existing private drainage system discharges to the ordinary watercourse shown, which continues downstream towards Felbridge Water.
4. LiDAR terrain data demonstrates a continuous topographic fall from the Floran Farm holding along the identified downstream drainage corridor towards Felbridge Water.
5. Surface water from the proposed development will be attenuated and restricted to the QBAR greenfield runoff rate of 2.9 l/s prior to discharge to the existing private drainage system.
6. Foul flows will be treated by the proposed package treatment plant prior to discharge to the existing private drainage system. Design treated effluent discharge is approximately 4.95 m³/day.
7. Flow arrows indicate the established direction of drainage towards the receiving ordinary watercourse and onwards towards Felbridge Water.
8. Refer to Appendix A – Photographic Evidence of Existing Drainage Infrastructure and Appendix B – LiDAR Terrain and Downstream Connectivity Evidence

