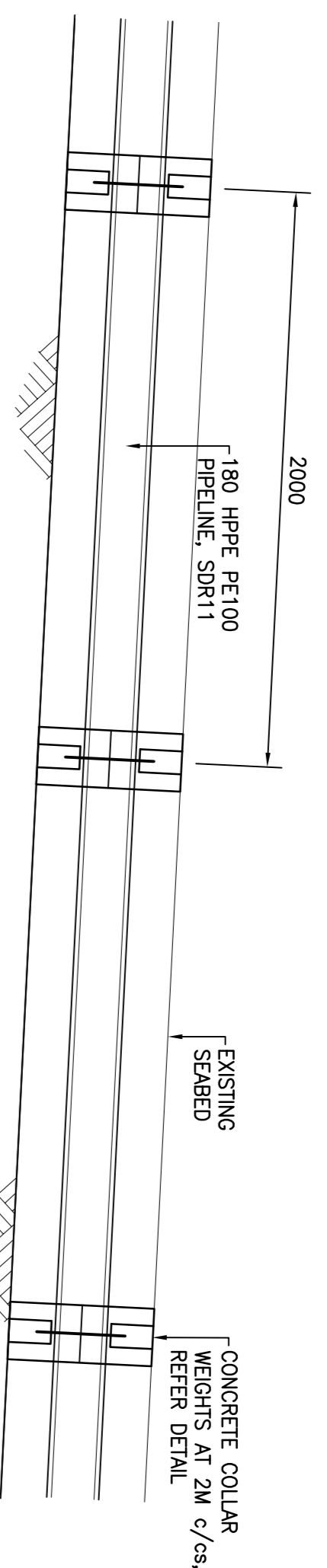
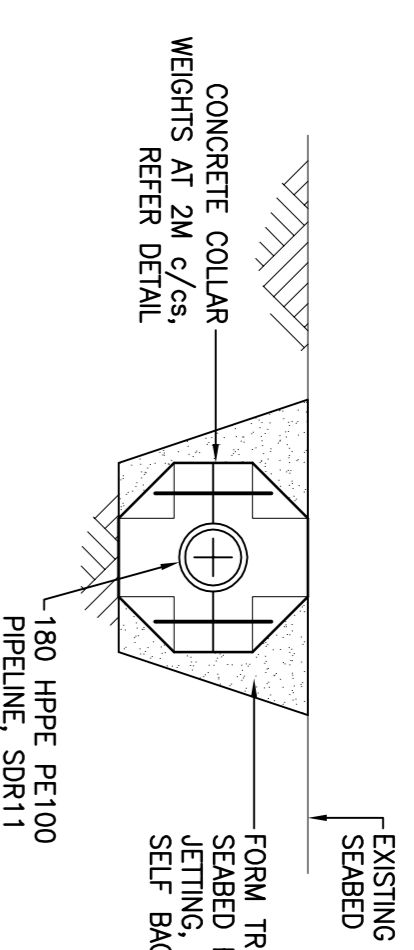


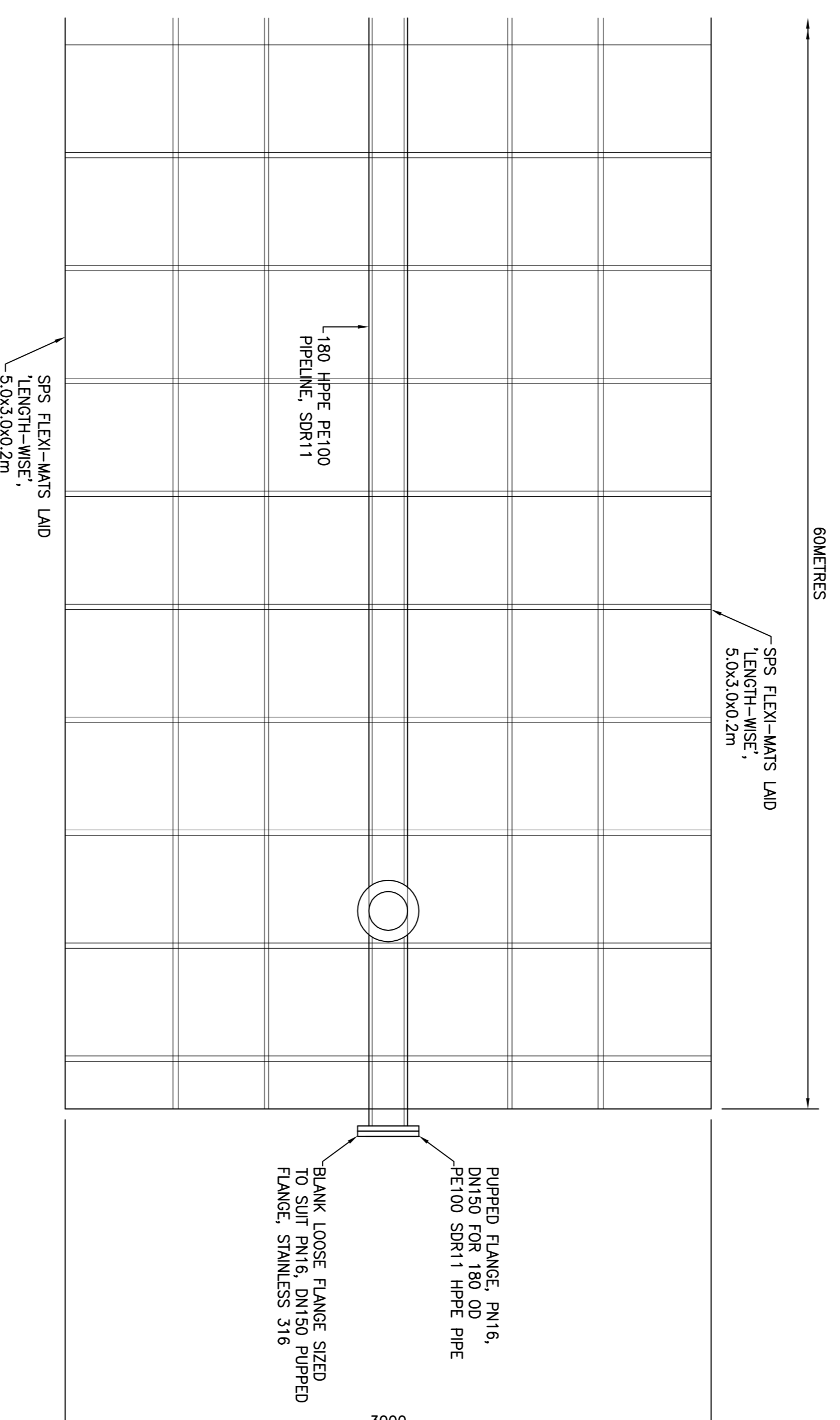
**CONCRETE WEIGHT DETAIL**  
 (Scale 1:20)



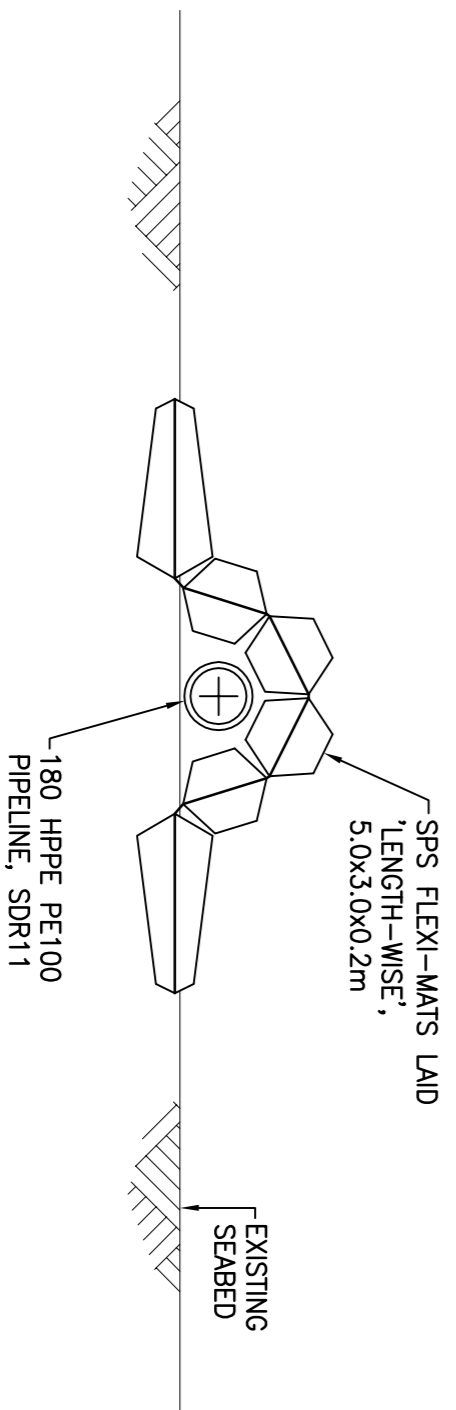
**PART LONG SECTION SHOWING CONCRETE WEIGHTS**  
 (Scale 1:20)



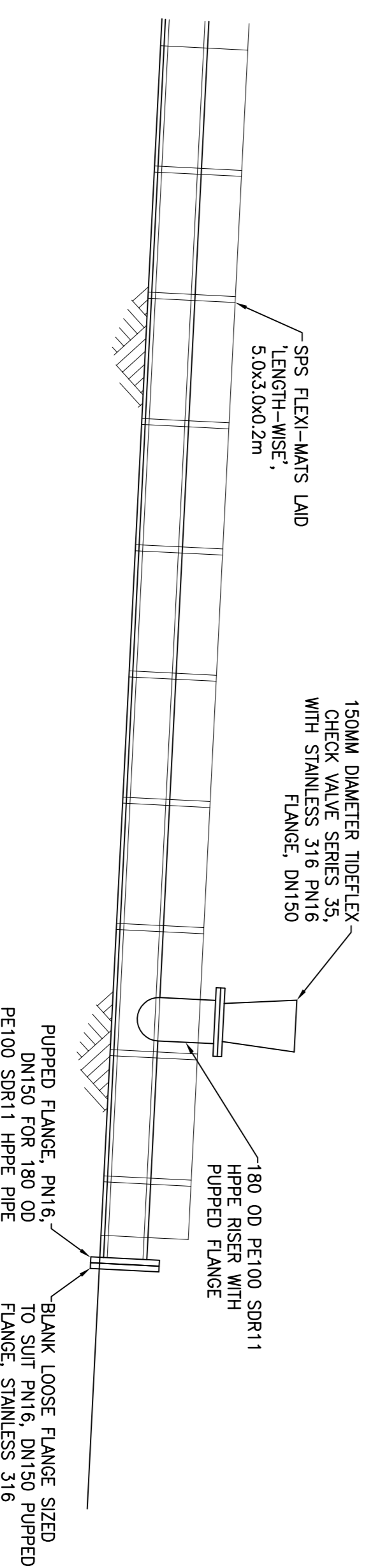
**PIPE 'E' BEDDING DETAIL**  
 (Scale 1:20)



**PLAN ON OUTFALL DIFFUSER**  
 (Scale 1:20)



**SECTION SHOWING CONCRETE MAT PROTECTION**  
 (Scale 1:20)



**LONGITUDINAL SECTION AT DIFFUSER**  
 (Scale 1:20)

**NOTES**

1. INSTALLATION OF DIFFUSER TO BE CARRIED OUT AT 18METRES BELOW CHART DATUM IN TIDAL CROMARY FIRTH.
2. INSPECT AND CLEAR SEABED OF ANY DEBRIS OR HARD SPOTS. AIR LIFT TO FILL ANY LOW SPOTS.
3. DIFFUSER RISER TO BE FUSION WELDED TO OUTFALL PIPE AND FITTED WITH PUPPED FLANGE AS SHOWN TO MINIMISE DIVER WORK.
4. PIPE 'E' POLYETHYLENE PIPE TO BE PE100, SDR11, 180 OD, PIPE 'D' TO BE PE100RT, SDR11, 180 OD.
5. ALL FLANGES, BLANK FLANGE PLATES NUTS, BOLTS WASHERS ETC TO BE STAINLESS GRADE 316.
6. COMPLETED WORK TO BE RECORDED BY DIVER VIDEO SURVEY.
7. PIPE 'E' TO BE ASSEMBLED OFF-SITE, FLOATED TO LOCATION AND SUNK IN POSITION. PIPE 'D' TO BE ASSEMBLED OFF-SITE, FLOATED TO LOCATION AND WINCHED UP INSIDE THE EXISTING 800 DIAMETER OUTFALL TO THE EXISTING SHORE CHAMBER. PIPES 'D' AND 'E' TO BE CONNECTED ON THE SEABED WITH A 45 DEGREE FLANGED ELBOW.

REVISIONS	Client:
	<b>WHYTE &amp; MACKAY</b>

Job:  
**PROPOSED OUTFALL EXTENSION  
 INVERGORDON DISTILLERY, INVERGORDON**

Title:  
**PROPOSED OUTFALL DETAILS - SHEET 1**

**KWA**  
**Consulting Engineers**  
 Ward College, Roggan Bank,  
 Burnt Place, Dingwall  
 IV15 9ND  
 Tel: (01549) 863333 Email: info@kwakel.net

Drawn: DAM/C	Scale: 1:20	Drawing No: <b>KWA/18066/101</b>
Chk'd: [ ]	Date: 23.08.18	Rev: [ ]