



**FORM DQP 2.01-1
LEVEL 1 CHECK PRINT SIGN-OFF SHEET**

Client Name: Ohio Department of Transportation

Job Title: Cleveland Innerbelt Design-Build Contract

Job Number: CUY-90-14.90

Document Title: Unit 2 - Walsh CW check - shear stud height

Check Level (Mark One): 1A 100% Document Check
 1B 100% Input Check

Enter description below:

	Print Name	Signature	Date
<input checked="" type="checkbox"/> Originator	<u>SARAH LARSON</u>	<u>Sarah Larson</u>	<u>6-19-12</u>
<input checked="" type="checkbox"/> Checker	<u>David Glastetter</u>	<u>D. Glastetter</u>	<u>6/20/12</u>
<input checked="" type="checkbox"/> Backchecker	<u>SARAH LARSON</u>	<u>Sarah Larson</u>	<u>6-20-12</u>
<input checked="" type="checkbox"/> Updater	<u>SARAH LARSON</u>	<u>Sarah Larson</u>	<u>6-20-12</u>
<input checked="" type="checkbox"/> Validator	<u>David Glastetter</u>	<u>D. Glastetter</u>	<u>6/20/12</u>

Insert an "X" in the box to indicate a required QC activity.

HNTB The HNTB Companies For Cleveland Innerbelt - Unit 2	Made SJL	Date 6/19/2012	Job Number 49633
	Checked DJG	Date 6/20/2012	
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\\kcow00\Jobs\49633\Bridges\Design\Final Design\Unit 2\Walsh CW Check\Haunch_Height_comparison_2012-5-1.xlsm\shear stud check

This calculation uses deflections from final geometry and counterweight used by Genesis in the erection analysis.

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	<u>Girder 1</u>						
Span 3	1000	3.750	9	8	6.750	9.500	OK
	1001	3.498	9	8	6.498	9.248	OK
	1002	3.342	9	8	6.342	9.092	OK
	1003	3.198	9	8	6.198	8.948	OK
	1004	3.054	9	8	6.054	8.804	OK
	1005	2.934	9	8	5.934	8.684	OK
	1006	2.814	9	8	5.814	8.564	OK
	1007	2.730	9	8	5.730	8.480	OK
	1008	2.670	9	8	5.670	8.420	OK
	1009	2.622	9	8	5.622	8.372	OK
	1010	2.586	9	8	5.586	8.336	OK
	1011	2.586	9	8	5.586	8.336	OK
	1012	2.622	9	8	5.622	8.372	OK
	1013	2.670	9	8	5.670	8.420	OK
	1014	2.742	9	8	5.742	8.492	OK
	1015	2.862	9	8	5.862	8.612	OK
	1016	3.196	9	8	6.196	8.946	OK
	1017	3.316	9	8	6.316	9.066	OK
	1018	3.448	9	8	6.448	9.198	OK
	1019	3.568	9	8	6.568	9.318	OK
	1020	3.676	9	8	6.676	9.426	OK
	1021	3.748	9	8	6.748	9.498	OK
	1022	3.808	9	8	6.808	9.558	OK
	1023	3.868	9	8	6.868	9.618	OK
	1024	3.916	9	8	6.916	9.666	OK
	1025	3.976	9	8	6.976	9.726	OK
	1026	4.024	9	8	7.024	9.774	OK
1027	4.060	9	8	7.060	9.810	OK	
CL Pier 3	1028	4.096	9	8	7.096	9.846	OK
	1029	4.120	9	8	7.120	9.870	OK
	1030	4.168	9	8	7.168	9.918	OK
	1031	4.204	9	8	7.204	9.954	OK
	1032	4.252	9	8	7.252	10.002	OK
	1033	4.288	9	8	7.288	10.038	OK
	1034	4.324	9	8	7.324	10.074	OK
	1035	4.372	9	8	7.372	10.122	OK
	1036	4.408	9	8	7.408	10.158	OK
	1037	4.468	9	8	7.468	10.218	OK
	1038	4.528	9	8	7.528	10.278	OK
	1039	4.600	9	8	7.600	10.350	OK
	1040	4.636	9	8	7.636	10.386	OK
	1041	4.636	9	8	7.636	10.386	OK
	1042	4.588	9	8	7.588	10.338	OK
	1043	4.504	9	8	7.504	10.254	OK
	1044	4.384	9	8	7.384	10.134	OK
	1045	4.252	9	8	7.252	10.002	OK
	1046	4.108	9	8	7.108	9.858	OK
	1047	3.976	9	8	6.976	9.726	OK
	1048	3.832	9	8	6.832	9.582	OK
	1049	3.724	9	8	6.724	9.474	OK
	1050	3.640	9	8	6.640	9.390	OK
	1051	3.592	9	8	6.592	9.342	OK
	1052	3.342	9	8	6.342	9.092	OK
	1053	3.878	9	8	6.878	9.628	OK
	1054	2.938	9	8	5.938	8.688	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	1055	2.998	9	8	5.998	8.748	OK
	1056	3.058	9	8	6.058	8.808	OK
	1057	3.094	9	8	6.094	8.844	OK
	1058	3.118	9	8	6.118	8.868	OK
	1059	3.154	9	8	6.154	8.904	OK
	1060	3.178	9	8	6.178	8.928	OK
	1061	3.214	9	8	6.214	8.964	OK
	1062	3.238	9	8	6.238	8.988	OK
	1063	3.262	9	8	6.262	9.012	OK
CL Pier 4	1064	3.286	9	8	6.286	9.036	OK
	1065	3.298	9	8	6.298	9.048	OK
	1066	3.322	9	8	6.322	9.072	OK
	1067	3.358	9	8	6.358	9.108	OK
	1068	3.394	9	8	6.394	9.144	OK
	1069	3.406	9	8	6.406	9.156	OK
	1070	3.454	9	8	6.454	9.204	OK
	1071	3.478	9	8	6.478	9.228	OK
	1072	3.526	9	8	6.526	9.276	OK
	1073	3.586	9	8	6.586	9.336	OK
	1074	3.658	9	8	6.658	9.408	OK
	1075	3.754	9	8	6.754	9.504	OK
	1076	4.314	9	8	7.314	10.064	OK
	1077	4.612	9	8	7.612	10.362	OK
	1078	4.148	9	8	7.148	9.898	OK
	1079	4.172	9	8	7.172	9.922	OK
	1080	4.184	9	8	7.184	9.934	OK
	1081	4.196	9	8	7.196	9.946	OK
	1082	4.220	9	8	7.220	9.970	OK
	1083	4.232	9	8	7.232	9.982	OK
	1084	4.268	9	8	7.268	10.018	OK
	1085	4.304	9	8	7.304	10.054	OK
	1086	4.364	9	8	7.364	10.114	OK
	1087	4.436	9	8	7.436	10.186	OK
	1088	4.520	9	8	7.520	10.270	OK
	1089	2.398	9	8	5.398	8.148	OK
	1090	2.458	9	8	5.458	8.208	OK
	1091	2.554	9	8	5.554	8.304	OK
	1092	2.936	9	8	5.936	8.686	OK
	1093	3.044	9	8	6.044	8.794	OK
	1094	3.152	9	8	6.152	8.902	OK
	1095	3.474	9	8	6.474	9.224	OK
	1096	3.034	9	8	6.034	8.784	OK
	1097	3.094	9	8	6.094	8.844	OK
	1098	3.154	9	8	6.154	8.904	OK
	1099	3.202	9	8	6.202	8.952	OK
	1100	3.262	9	8	6.262	9.012	OK
CL Pier 5	1101	3.286	9	8	6.286	9.036	OK
	1102	3.334	9	8	6.334	9.084	OK
	1103	3.382	9	8	6.382	9.132	OK
	1104	3.406	9	8	6.406	9.156	OK
	1105	3.466	9	8	6.466	9.216	OK
	1106	3.502	9	8	6.502	9.252	OK
	1107	3.550	9	8	6.550	9.300	OK
	1108	3.598	9	8	6.598	9.348	OK
	1109	3.646	9	8	6.646	9.396	OK
	1110	3.956	9	8	6.956	9.706	OK
	1111	4.028	9	8	7.028	9.778	OK
	1112	4.100	9	8	7.100	9.850	OK
	1113	4.434	9	8	7.434	10.184	OK
	1114	3.994	9	8	6.994	9.744	OK
	1115	4.018	9	8	7.018	9.768	OK
	1116	4.768	9	8	7.768	10.518	OK
	1117	4.744	9	8	7.744	10.494	OK
	1118	4.708	9	8	7.708	10.458	OK
	1119	4.648	9	8	7.648	10.398	OK
	1120	4.576	9	8	7.576	10.326	OK

Clear to top of stud = 3.25 in

JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)		
	1121	4.504	9	8	7.504	10.254	OK
	1122	4.420	9	8	7.420	10.170	OK
	1123	4.348	9	8	7.348	10.098	OK
	1124	4.288	9	8	7.288	10.038	OK
	1125	4.240	9	8	7.240	9.990	OK
	1126	4.204	9	8	7.204	9.954	OK
	1127	4.180	9	8	7.180	9.930	OK
	1128	4.192	9	8	7.192	9.942	OK
	1129	4.216	9	8	7.216	9.966	OK
	1130	3.752	9	8	6.752	9.502	OK
	1131	3.776	9	8	6.776	9.526	OK
	1132	3.812	9	8	6.812	9.562	OK
	1133	3.824	9	8	6.824	9.574	OK
	1134	4.098	9	8	7.098	9.848	OK
	1135	4.110	9	8	7.110	9.860	OK
	1136	4.122	9	8	7.122	9.872	OK
	1137	4.134	9	8	7.134	9.884	OK
	1138	4.134	9	8	7.134	9.884	OK
	1139	4.158	9	8	7.158	9.908	OK
CL Pier 6	1140	4.158	9	8	7.158	9.908	OK
	1141	4.170	9	8	7.170	9.920	OK
	1142	4.182	9	8	7.182	9.932	OK
	1143	4.206	9	8	7.206	9.956	OK
	1144	4.218	9	8	7.218	9.968	OK
	1145	4.230	9	8	7.230	9.980	OK
	1146	4.254	9	8	7.254	10.004	OK
	1147	4.278	9	8	7.278	10.028	OK
	1148	4.040	9	8	7.040	9.790	OK
	1149	4.064	9	8	7.064	9.814	OK
	1150	4.100	9	8	7.100	9.850	OK
	1151	4.136	9	8	7.136	9.886	OK
	1152	4.648	9	8	7.648	10.398	OK
	1153	4.648	9	8	7.648	10.398	OK
	1154	4.838	9	8	7.838	10.588	OK
	1155	4.778	9	8	7.778	10.528	OK
	1156	4.694	9	8	7.694	10.444	OK
	1157	4.622	9	8	7.622	10.372	OK
	1158	4.538	9	8	7.538	10.288	OK
	1159	4.466	9	8	7.466	10.216	OK
	1160	4.406	9	8	7.406	10.156	OK
	1161	4.358	9	8	7.358	10.108	OK
	1162	4.322	9	8	7.322	10.072	OK
	1163	4.572	9	8	7.572	10.322	OK
	1164	4.096	9	8	7.096	9.846	OK
	1165	4.394	9	8	7.394	10.144	OK
	1166	3.966	9	8	6.966	9.716	OK
	1167	4.014	9	8	7.014	9.764	OK
	1168	4.074	9	8	7.074	9.824	OK
	1169	4.110	9	8	7.110	9.860	OK
	1170	4.122	9	8	7.122	9.872	OK
	1171	4.158	9	8	7.158	9.908	OK
	1172	4.170	9	8	7.170	9.920	OK
	1173	4.194	9	8	7.194	9.944	OK
	1174	4.218	9	8	7.218	9.968	OK
	1175	4.230	9	8	7.230	9.980	OK
CL Pier 7	1176	4.242	9	8	7.242	9.992	OK
	1177	4.266	9	8	7.266	10.016	OK
	1178	4.278	9	8	7.278	10.028	OK
	1179	4.229	9	8	7.229	9.979	OK
	1180	4.303	9	8	7.303	10.053	OK
	1181	4.269	9	8	7.269	10.019	OK
	1182	4.298	9	8	7.298	10.048	OK
	1183	4.338	9	8	7.338	10.088	OK
	1184	4.399	9	8	7.399	10.149	OK
	1185	4.377	9	8	7.377	10.127	OK
	1186	4.385	9	8	7.385	10.135	OK

Clear to top of stud = 3.25 in

JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)		
	1187	3.734	10	8	6.734	10.151	OK
	1188	3.579	10	8	6.579	10.329	OK
	1189	3.600	10	8	6.600	10.350	OK
	1190	3.285	10	8	6.285	10.035	OK
	1191	3.172	10	8	6.172	9.922	OK
	1192	3.052	10	8	6.052	9.802	OK
	1193	2.945	10	8	5.945	9.695	OK
	1194	2.897	10	8	5.897	9.647	OK
	1195	2.856	10	8	5.856	9.606	OK
	1196	2.748	10	8	5.748	9.498	OK
	1197	2.673	10	8	5.673	9.423	OK
	1198	2.670	10	8	5.670	9.420	OK
	1199	2.693	10	8	5.693	9.443	OK
	1200	2.633	10	8	5.633	9.383	OK
	1201	2.969	10	8	5.969	9.719	OK
	1202	2.781	10	8	5.781	9.531	OK
	1203	2.667	10	8	5.667	9.417	OK
	1204	2.433	10	8	5.433	9.183	OK
	1205	2.355	10	8	5.355	9.105	OK
	1206	2.448	10	8	5.448	9.198	OK
	1207	2.438	10	8	5.438	9.188	OK
	1208	2.454	10	8	5.454	9.204	OK
	1209	2.578	10	8	5.578	9.328	OK
	1210	2.686	10	8	5.686	9.436	OK
	1211	2.761	10	8	5.761	9.511	OK
CL Pier 8	1212	2.836	10	8	5.836	9.586	OK
	1213	2.814	10	8	5.814	9.564	OK
	1214	2.894	10	8	5.894	9.644	OK
	1215	3.121	10	8	6.121	9.871	OK
	1216	3.122	10	8	6.122	9.872	OK
	1217	3.124	10	8	6.124	9.874	OK
	1218	3.147	10	8	6.147	9.897	OK
	1219	3.218	10	8	6.218	9.968	OK
	1220	3.176	10	8	6.176	9.926	OK
	1221	3.103	10	8	6.103	9.853	OK
	1222	2.836	10	8	5.836	9.586	OK
	1223	2.353	10	8	5.353	9.103	OK
	1224	2.968	10	8	5.968	9.718	OK
	1225	3.095	10	8	6.095	9.845	OK
	1226	2.678	10	8	5.678	9.428	OK
	1227	2.633	10	8	5.633	9.383	OK
	1228	2.496	10	8	5.496	9.246	OK
	1229	2.378	10	8	5.378	9.128	OK
	1230	2.250	10	8	5.250	9.000	OK
	1231	2.226	10	8	5.226	8.976	OK
	1232	2.226	10	8	5.226	8.976	OK
	1233	2.226	10	8	5.226	8.976	OK
	1234	2.250	10	8	5.250	9.000	OK
	1235	2.762	10	8	5.762	9.512	OK
	1236	2.786	10	8	5.786	9.536	OK
	1237	2.810	10	8	5.810	9.560	OK
	1238	2.072	10	8	5.072	8.822	OK
	1239	2.084	10	8	5.084	8.834	OK
	1240	2.084	10	8	5.084	8.834	OK
	1241	2.096	10	8	5.096	8.846	OK
	1242	2.108	10	8	5.108	8.858	OK
	1243	2.108	10	8	5.108	8.858	OK
	1244	2.108	10	8	5.108	8.858	OK
	1245	2.096	10	8	5.096	8.846	OK
	1246	2.096	10	8	5.096	8.846	OK
	1247	2.084	10	8	5.084	8.834	OK
CL Pier 9	1248	2.072	10	7	5.072	8.822	OK

Clear to top of stud = 3.25 in

JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)		
	1249	2.060	10	7	5.060	8.810	OK
	1250	2.036	10	7	5.036	8.786	OK
	1251	2.024	10	7	5.024	8.774	OK
	1252	2.000	10	7	5.000	8.750	OK
	1253	1.976	10	7	4.976	8.726	OK
	1254	1.964	10	7	4.964	8.714	OK
	1255	1.964	10	7	4.964	8.714	OK
	1256	1.952	10	7	4.952	8.702	OK
	1257	1.928	10	7	4.928	8.678	OK
	1258	1.916	10	7	4.916	8.666	OK
	1259	2.642	10	7	5.642	9.392	OK
	1260	2.630	10	7	5.630	9.380	OK
	1261	2.606	10	7	5.606	9.356	OK
	1262	2.594	10	7	5.594	9.344	OK
	1263	2.546	10	7	5.546	9.296	OK
	1264	2.498	10	7	5.498	9.248	OK
	1265	2.426	10	7	5.426	9.176	OK
	1266	2.366	10	7	5.366	9.116	OK
	1267	2.306	10	7	5.306	9.056	OK
	1268	2.270	10	7	5.270	9.020	OK
	1269	2.210	10	7	5.210	8.960	OK
	1270	2.198	10	7	5.198	8.948	OK
	1271	2.198	10	7	5.198	8.948	OK
	1272	2.210	10	7	5.210	8.960	OK
	1273	1.960	10	7	4.960	8.710	OK
	1274	1.996	10	7	4.996	8.746	OK
	1275	2.520	10	7	5.520	9.270	OK
	1276	1.556	10	7	4.556	8.306	OK
	1277	1.604	10	7	4.604	8.354	OK
	1278	1.688	10	7	4.688	8.438	OK
	1279	1.736	10	7	4.736	8.486	OK
	1280	1.808	10	7	4.808	8.558	OK
	1281	1.832	10	7	4.832	8.582	OK
	1282	2.904	9	7	5.904	8.654	OK
	1283	2.988	9	7	5.988	8.738	OK
	1284	3.060	9	7	6.060	8.810	OK
CL Pier 10	1285	3.108	9	7	6.108	8.858	OK
	1286	3.168	9	8	6.168	8.918	OK
	1287	3.228	9	8	6.228	8.978	OK
	1288	3.276	9	8	6.276	9.026	OK
	1289	3.324	9	8	6.324	9.074	OK
	1290	3.336	9	8	6.336	9.086	OK
	1291	3.384	9	8	6.384	9.134	OK
	1292	3.396	9	8	6.396	9.146	OK
	1293	3.456	9	8	6.456	9.206	OK
	1294	3.480	9	8	6.480	9.230	OK
	1295	3.516	9	8	6.516	9.266	OK
	1296	4.028	9	8	7.028	9.778	OK
	1297	4.052	9	8	7.052	9.802	OK
	1298	4.052	9	8	7.052	9.802	OK
	1299	3.576	9	8	6.576	9.326	OK
	1300	3.600	9	8	6.600	9.350	OK
	1301	3.600	9	8	6.600	9.350	OK
	1302	3.612	9	8	6.612	9.362	OK
	1303	3.600	9	8	6.600	9.350	OK
	1304	3.600	9	8	6.600	9.350	OK
	1305	3.576	9	8	6.576	9.326	OK
	1306	3.540	9	8	6.540	9.290	OK
	1307	3.492	9	8	6.492	9.242	OK
	1308	3.444	9	8	6.444	9.194	OK
	1309	3.384	9	8	6.384	9.134	OK
	1310	3.300	9	8	6.300	9.050	OK
	1311	3.228	9	8	6.228	8.978	OK
	1312	3.144	9	8	6.144	8.894	OK
CL Pier 11	1313	3.000	9	8	6.000	8.750	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	<u>Girder 2</u>						
Span 3	3000	3.750	9	8	6.750	9.500	OK
	3001	3.594	9	8	6.594	9.344	OK
	3002	3.486	9	8	6.486	9.236	OK
	3003	3.378	9	8	6.378	9.128	OK
	3004	3.282	9	8	6.282	9.032	OK
	3005	3.186	9	8	6.186	8.936	OK
	3006	3.102	9	8	6.102	8.852	OK
	3007	3.030	9	8	6.030	8.780	OK
	3008	2.970	9	8	5.970	8.720	OK
	3009	2.922	9	8	5.922	8.672	OK
	3010	2.886	9	8	5.886	8.636	OK
	3011	2.862	9	8	5.862	8.612	OK
	3012	2.862	9	8	5.862	8.612	OK
	3013	2.886	9	8	5.886	8.636	OK
	3014	2.922	9	8	5.922	8.672	OK
	3015	3.006	9	8	6.006	8.756	OK
	3016	3.316	9	8	6.316	9.066	OK
	3017	3.412	9	8	6.412	9.162	OK
	3018	3.496	9	8	6.496	9.246	OK
	3019	3.580	9	8	6.580	9.330	OK
	3020	3.664	9	8	6.664	9.414	OK
	3021	3.724	9	8	6.724	9.474	OK
	3022	3.772	9	8	6.772	9.522	OK
	3023	3.820	9	8	6.820	9.570	OK
	3024	3.868	9	8	6.868	9.618	OK
	3025	3.916	9	8	6.916	9.666	OK
	3026	3.964	9	8	6.964	9.714	OK
3027	4.000	9	8	7.000	9.750	OK	
CL Pier 3	3028	4.024	9	8	7.024	9.774	OK
	3029	4.072	9	8	7.072	9.822	OK
	3030	4.096	9	8	7.096	9.846	OK
	3031	4.144	9	8	7.144	9.894	OK
	3032	4.180	9	8	7.180	9.930	OK
	3033	4.228	9	8	7.228	9.978	OK
	3034	4.276	9	8	7.276	10.026	OK
	3035	4.312	9	8	7.312	10.062	OK
	3036	4.372	9	8	7.372	10.122	OK
	3037	4.444	9	8	7.444	10.194	OK
	3038	4.528	9	8	7.528	10.278	OK
	3039	4.612	9	8	7.612	10.362	OK
	3040	4.672	9	8	7.672	10.422	OK
	3041	4.696	9	8	7.696	10.446	OK
	3042	4.672	9	8	7.672	10.422	OK
	3043	4.600	9	8	7.600	10.350	OK
	3044	4.504	9	8	7.504	10.254	OK
	3045	4.384	9	8	7.384	10.134	OK
	3046	4.252	9	8	7.252	10.002	OK
	3047	4.108	9	8	7.108	9.858	OK
	3048	3.964	9	8	6.964	9.714	OK
	3049	3.844	9	8	6.844	9.594	OK
	3050	3.748	9	8	6.748	9.498	OK
	3051	3.676	9	8	6.676	9.426	OK
	3052	3.414	9	8	6.414	9.164	OK
	3053	3.926	9	8	6.926	9.676	OK
	3054	2.974	9	8	5.974	8.724	OK
	3055	3.010	9	8	6.010	8.760	OK
	3056	3.046	9	8	6.046	8.796	OK
	3057	3.082	9	8	6.082	8.832	OK
	3058	3.106	9	8	6.106	8.856	OK
	3059	3.130	9	8	6.130	8.880	OK
	3060	3.154	9	8	6.154	8.904	OK
	3061	3.190	9	8	6.190	8.940	OK
	3062	3.202	9	8	6.202	8.952	OK
	3063	3.226	9	8	6.226	8.976	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
CL Pier 4	3064	3.238	9	8	6.238	8.988	OK
	3065	3.262	9	8	6.262	9.012	OK
	3066	3.286	9	8	6.286	9.036	OK
	3067	3.310	9	8	6.310	9.060	OK
	3068	3.346	9	8	6.346	9.096	OK
	3069	3.370	9	8	6.370	9.120	OK
	3070	3.418	9	8	6.418	9.168	OK
	3071	3.442	9	8	6.442	9.192	OK
	3072	3.490	9	8	6.490	9.240	OK
	3073	3.562	9	8	6.562	9.312	OK
	3074	3.646	9	8	6.646	9.396	OK
	3075	3.730	9	8	6.730	9.480	OK
	3076	4.314	9	8	7.314	10.064	OK
	3077	4.612	9	8	7.612	10.362	OK
	3078	4.160	9	8	7.160	9.910	OK
	3079	4.184	9	8	7.184	9.934	OK
	3080	4.184	9	8	7.184	9.934	OK
	3081	4.196	9	8	7.196	9.946	OK
	3082	4.196	9	8	7.196	9.946	OK
	3083	4.196	9	8	7.196	9.946	OK
	3084	4.196	9	8	7.196	9.946	OK
	3085	4.208	9	8	7.208	9.958	OK
	3086	4.232	9	8	7.232	9.982	OK
	3087	4.268	9	8	7.268	10.018	OK
	3088	4.316	9	8	7.316	10.066	OK
	3089	2.566	9	8	5.566	8.316	OK
	3090	2.590	9	8	5.590	8.340	OK
	3091	2.662	9	8	5.662	8.412	OK
	3092	2.996	9	8	5.996	8.746	OK
	3093	3.080	9	8	6.080	8.830	OK
	3094	3.176	9	8	6.176	8.926	OK
	3095	3.486	9	8	6.486	9.236	OK
	3096	3.034	9	8	6.034	8.784	OK
	3097	3.082	9	8	6.082	8.832	OK
	3098	3.130	9	8	6.130	8.880	OK
	3099	3.178	9	8	6.178	8.928	OK
	3100	3.226	9	8	6.226	8.976	OK
CL Pier 5	3101	3.262	9	8	6.262	9.012	OK
	3102	3.298	9	8	6.298	9.048	OK
	3103	3.322	9	8	6.322	9.072	OK
	3104	3.358	9	8	6.358	9.108	OK
	3105	3.406	9	8	6.406	9.156	OK
	3106	3.442	9	8	6.442	9.192	OK
	3107	3.478	9	8	6.478	9.228	OK
	3108	3.526	9	8	6.526	9.276	OK
	3109	3.574	9	8	6.574	9.324	OK
	3110	3.884	9	8	6.884	9.634	OK
	3111	3.956	9	8	6.956	9.706	OK
	3112	4.040	9	8	7.040	9.790	OK
	3113	4.374	9	8	7.374	10.124	OK
	3114	3.958	9	8	6.958	9.708	OK
	3115	3.994	9	8	6.994	9.744	OK
	3116	4.768	9	8	7.768	10.518	OK
	3117	4.768	9	8	7.768	10.518	OK
	3118	4.720	9	8	7.720	10.470	OK
	3119	4.684	9	8	7.684	10.434	OK
	3120	4.612	9	8	7.612	10.362	OK
	3121	4.540	9	8	7.540	10.290	OK
	3122	4.456	9	8	7.456	10.206	OK
	3123	4.396	9	8	7.396	10.146	OK
	3124	4.312	9	8	7.312	10.062	OK
	3125	4.252	9	8	7.252	10.002	OK
	3126	4.216	9	8	7.216	9.966	OK
	3127	4.180	9	8	7.180	9.930	OK
	3128	4.168	9	8	7.168	9.918	OK
	3129	4.192	9	8	7.192	9.942	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	3130	3.728	9	8	6.728	9.478	OK
	3131	3.764	9	8	6.764	9.514	OK
	3132	3.788	9	8	6.788	9.538	OK
	3133	3.812	9	8	6.812	9.562	OK
	3134	4.074	9	8	7.074	9.824	OK
	3135	4.086	9	8	7.086	9.836	OK
	3136	4.086	9	8	7.086	9.836	OK
	3137	4.098	9	8	7.098	9.848	OK
	3138	4.122	9	8	7.122	9.872	OK
	3139	4.122	9	8	7.122	9.872	OK
CL Pier 6	3140	4.134	9	8	7.134	9.884	OK
	3141	4.146	9	8	7.146	9.896	OK
	3142	4.146	9	8	7.146	9.896	OK
	3143	4.170	9	8	7.170	9.920	OK
	3144	4.170	9	8	7.170	9.920	OK
	3145	4.194	9	8	7.194	9.944	OK
	3146	4.206	9	8	7.206	9.956	OK
	3147	4.218	9	8	7.218	9.968	OK
	3148	4.004	9	8	7.004	9.754	OK
	3149	4.028	9	8	7.028	9.778	OK
	3150	4.064	9	8	7.064	9.814	OK
	3151	4.112	9	8	7.112	9.862	OK
	3152	4.648	9	8	7.648	10.398	OK
	3153	4.648	9	8	7.648	10.398	OK
	3154	4.862	9	8	7.862	10.612	OK
	3155	4.814	9	8	7.814	10.564	OK
	3156	4.730	9	8	7.730	10.480	OK
	3157	4.658	9	8	7.658	10.408	OK
	3158	4.562	9	8	7.562	10.312	OK
	3159	4.490	9	8	7.490	10.240	OK
	3160	4.418	9	8	7.418	10.168	OK
	3161	4.346	9	8	7.346	10.096	OK
	3162	4.298	9	8	7.298	10.048	OK
	3163	4.536	9	8	7.536	10.286	OK
	3164	4.036	9	8	7.036	9.786	OK
	3165	4.322	9	8	7.322	10.072	OK
	3166	3.894	9	8	6.894	9.644	OK
	3167	3.930	9	8	6.930	9.680	OK
	3168	3.990	9	8	6.990	9.740	OK
	3169	4.026	9	8	7.026	9.776	OK
	3170	4.050	9	8	7.050	9.800	OK
	3171	4.074	9	8	7.074	9.824	OK
	3172	4.098	9	8	7.098	9.848	OK
	3173	4.122	9	8	7.122	9.872	OK
	3174	4.146	9	8	7.146	9.896	OK
	3175	4.158	9	8	7.158	9.908	OK
CL Pier 7	3176	4.158	9	8	7.158	9.908	OK
	3177	4.182	9	8	7.182	9.932	OK
	3178	4.182	9	8	7.182	9.932	OK
	3179	4.240	9	8	7.240	9.990	OK
	3180	4.227	9	8	7.227	9.977	OK
	3181	4.214	9	8	7.214	9.964	OK
	3182	4.246	9	8	7.246	9.996	OK
	3183	4.309	9	8	7.309	10.059	OK
	3184	4.285	9	8	7.285	10.035	OK
	3185	4.264	9	8	7.264	10.014	OK
	3186	4.333	9	8	7.333	10.083	OK
	3187	3.697	10	8	6.697	10.114	OK
	3188	3.583	10	8	6.583	10.333	OK
	3189	3.526	10	8	6.526	10.276	OK
	3190	3.283	10	8	6.283	10.033	OK
	3191	3.176	10	8	6.176	9.926	OK
	3192	3.105	10	8	6.105	9.855	OK
	3193	3.033	10	8	6.033	9.783	OK
	3194	2.948	10	8	5.948	9.698	OK
	3195	2.891	10	8	5.891	9.641	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	3196	2.764	10	8	5.764	9.514	OK
	3197	2.721	10	8	5.721	9.471	OK
	3198	2.655	10	8	5.655	9.405	OK
	3199	2.678	10	8	5.678	9.428	OK
	3200	2.651	10	8	5.651	9.401	OK
	3201	3.020	10	8	6.020	9.770	OK
	3202	2.779	10	8	5.779	9.529	OK
	3203	2.552	10	8	5.552	9.302	OK
	3204	2.353	10	8	5.353	9.103	OK
	3205	2.206	10	8	5.206	8.956	OK
	3206	2.188	10	8	5.188	8.938	OK
	3207	2.258	10	8	5.258	9.008	OK
	3208	2.392	10	8	5.392	9.142	OK
	3209	2.459	10	8	5.459	9.209	OK
	3210	2.514	10	8	5.514	9.264	OK
CL Pier 8	3211	2.543	10	8	5.543	9.293	OK
	3212	2.584	10	8	5.584	9.334	OK
	3213	2.678	10	8	5.678	9.428	OK
	3214	2.752	10	8	5.752	9.502	OK
	3215	2.762	10	8	5.762	9.512	OK
	3216	2.861	10	8	5.861	9.611	OK
	3217	2.889	10	8	5.889	9.639	OK
	3218	2.919	10	8	5.919	9.669	OK
	3219	2.980	10	8	5.980	9.730	OK
	3220	2.950	10	8	5.950	9.700	OK
	3221	2.913	10	8	5.913	9.663	OK
	3222	2.809	10	8	5.809	9.559	OK
	3223	2.639	10	8	5.639	9.389	OK
	3224	3.076	10	8	6.076	9.826	OK
	3225	3.150	10	8	6.150	9.900	OK
	3226	3.235	10	8	6.235	9.985	OK
	3227	2.680	10	8	5.680	9.430	OK
	3228	2.617	10	8	5.617	9.367	OK
	3229	2.444	10	8	5.444	9.194	OK
	3230	2.334	10	8	5.334	9.084	OK
	3231	2.310	10	8	5.310	9.060	OK
	3232	2.286	10	8	5.286	9.036	OK
	3233	2.286	10	8	5.286	9.036	OK
	3234	2.286	10	8	5.286	9.036	OK
	3235	2.798	10	8	5.798	9.548	OK
	3236	2.810	10	8	5.810	9.560	OK
	3237	3.572	10	8	6.572	10.322	OK
	3238	2.096	10	8	5.096	8.846	OK
	3239	2.120	10	8	5.120	8.870	OK
	3240	2.132	10	8	5.132	8.882	OK
	3241	2.144	10	8	5.144	8.894	OK
	3242	2.144	10	8	5.144	8.894	OK
	3243	2.144	10	8	5.144	8.894	OK
	3244	2.144	10	8	5.144	8.894	OK
	3245	2.144	10	8	5.144	8.894	OK
	3246	2.120	10	8	5.120	8.870	OK
CL Pier 9	3247	2.108	10	7	5.108	8.858	OK
	3248	2.084	10	7	5.084	8.834	OK
	3249	2.060	10	7	5.060	8.810	OK
	3250	2.024	10	7	5.024	8.774	OK
	3251	2.012	10	7	5.012	8.762	OK
	3252	1.976	10	7	4.976	8.726	OK
	3253	1.964	10	7	4.964	8.714	OK
	3254	1.940	10	7	4.940	8.690	OK
	3255	1.928	10	7	4.928	8.678	OK
	3256	1.916	10	7	4.916	8.666	OK
	3257	1.904	10	7	4.904	8.654	OK
	3258	1.892	10	7	4.892	8.642	OK
	3259	2.630	10	7	5.630	9.380	OK
	3260	2.630	10	7	5.630	9.380	OK
	3261	2.630	10	7	5.630	9.380	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	3262	2.618	10	7	5.618	9.368	OK
	3263	2.594	10	7	5.594	9.344	OK
	3264	2.546	10	7	5.546	9.296	OK
	3265	2.498	10	7	5.498	9.248	OK
	3266	2.438	10	7	5.438	9.188	OK
	3267	2.378	10	7	5.378	9.128	OK
	3268	2.306	10	7	5.306	9.056	OK
	3269	2.258	10	7	5.258	9.008	OK
	3270	2.222	10	7	5.222	8.972	OK
	3271	2.198	10	7	5.198	8.948	OK
	3272	2.198	10	7	5.198	8.948	OK
	3273	1.960	10	7	4.960	8.710	OK
	3274	1.984	10	7	4.984	8.734	OK
	3275	1.496	10	7	4.496	8.246	OK
	3276	1.532	10	7	4.532	8.282	OK
	3277	1.580	10	7	4.580	8.330	OK
	3278	1.640	10	7	4.640	8.390	OK
	3279	1.700	10	7	4.700	8.450	OK
	3280	1.724	10	7	4.724	8.474	OK
	3281	1.760	10	7	4.760	8.510	OK
	3282	1.832	10	7	4.832	8.582	OK
	3283	1.880	10	7	4.880	8.630	OK
	3284	2.964	9	7	5.964	8.714	OK
CL Pier 10	3285	3.036	9	7	6.036	8.786	OK
	3286	3.108	9	7	6.108	8.858	OK
	3287	3.168	9	8	6.168	8.918	OK
	3288	3.228	9	8	6.228	8.978	OK
	3289	3.276	9	8	6.276	9.026	OK
	3290	3.324	9	8	6.324	9.074	OK
	3291	3.348	9	8	6.348	9.098	OK
	3292	3.384	9	8	6.384	9.134	OK
	3293	3.408	9	8	6.408	9.158	OK
	3294	3.432	9	8	6.432	9.182	OK
	3295	3.468	9	8	6.468	9.218	OK
	3296	3.516	9	8	6.516	9.266	OK
	3297	4.040	9	8	7.040	9.790	OK
	3298	4.052	9	8	7.052	9.802	OK
	3299	4.076	9	8	7.076	9.826	OK
	3300	4.100	9	8	7.100	9.850	OK
	3301	3.612	9	8	6.612	9.362	OK
	3302	3.636	9	8	6.636	9.386	OK
	3303	3.648	9	8	6.648	9.398	OK
	3304	3.648	9	8	6.648	9.398	OK
	3305	3.648	9	8	6.648	9.398	OK
	3306	3.624	9	8	6.624	9.374	OK
	3307	3.612	9	8	6.612	9.362	OK
	3308	3.564	9	8	6.564	9.314	OK
	3309	3.516	9	8	6.516	9.266	OK
	3310	3.468	9	8	6.468	9.218	OK
	3311	3.408	9	8	6.408	9.158	OK
	3312	3.336	9	8	6.336	9.086	OK
	3313	3.252	9	8	6.252	9.002	OK
	3314	3.156	9	8	6.156	8.906	OK
	3315	3.060	9	8	6.060	8.810	OK
CL Pier 11	3316	3.000	9	8	6.000	8.750	OK

Clear to top of stud = 3.25 in

JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)		
<u>Girder 3</u>							
Span 3	5000	3.750	9	8	6.750	9.500 OK	
	5001	3.642	9	8	6.642	9.392 OK	
	5002	3.546	9	8	6.546	9.296 OK	
	5003	3.450	9	8	6.450	9.200 OK	
	5004	3.366	9	8	6.366	9.116 OK	
	5005	3.282	9	8	6.282	9.032 OK	
	5006	3.198	9	8	6.198	8.948 OK	
	5007	3.138	9	8	6.138	8.888 OK	
	5008	3.090	9	8	6.090	8.840 OK	
	5009	3.042	9	8	6.042	8.792 OK	
	5010	3.006	9	8	6.006	8.756 OK	
	5011	2.982	9	8	5.982	8.732 OK	
	5012	2.982	9	8	5.982	8.732 OK	
	5013	2.982	9	8	5.982	8.732 OK	
	5014	3.006	9	8	6.006	8.756 OK	
	5015	3.078	9	8	6.078	8.828 OK	
	5016	3.376	9	8	6.376	9.126 OK	
	5017	3.448	9	8	6.448	9.198 OK	
	5018	3.520	9	8	6.520	9.270 OK	
	5019	3.592	9	8	6.592	9.342 OK	
	5020	3.652	9	8	6.652	9.402 OK	
	5021	3.724	9	8	6.724	9.474 OK	
	5022	3.760	9	8	6.760	9.510 OK	
	5023	3.796	9	8	6.796	9.546 OK	
	5024	3.844	9	8	6.844	9.594 OK	
	5025	3.892	9	8	6.892	9.642 OK	
	5026	3.916	9	8	6.916	9.666 OK	
	5027	3.952	9	8	6.952	9.702 OK	
	CL Pier 3	5028	3.988	9	8	6.988	9.738 OK
		5029	4.024	9	8	7.024	9.774 OK
5030		4.048	9	8	7.048	9.798 OK	
5031		4.096	9	8	7.096	9.846 OK	
5032		4.156	9	8	7.156	9.906 OK	
5033		4.192	9	8	7.192	9.942 OK	
5034		4.240	9	8	7.240	9.990 OK	
5035		4.300	9	8	7.300	10.050 OK	
5036		4.348	9	8	7.348	10.098 OK	
5037		4.432	9	8	7.432	10.182 OK	
5038		4.516	9	8	7.516	10.266 OK	
5039		4.600	9	8	7.600	10.350 OK	
5040		4.660	9	8	7.660	10.410 OK	
5041		4.684	9	8	7.684	10.434 OK	
5042		4.672	9	8	7.672	10.422 OK	
5043		4.612	9	8	7.612	10.362 OK	
5044		4.516	9	8	7.516	10.266 OK	
5045		4.408	9	8	7.408	10.158 OK	
5046		4.276	9	8	7.276	10.026 OK	
5047		4.144	9	8	7.144	9.894 OK	
5048		4.000	9	8	7.000	9.750 OK	
5049		3.880	9	8	6.880	9.630 OK	
5050		3.784	9	8	6.784	9.534 OK	
5051		3.712	9	8	6.712	9.462 OK	
5052		3.438	9	8	6.438	9.188 OK	
5053		3.950	9	8	6.950	9.700 OK	
5054		2.986	9	8	5.986	8.736 OK	
5055		3.022	9	8	6.022	8.772 OK	
5056		3.046	9	8	6.046	8.796 OK	
5057		3.082	9	8	6.082	8.832 OK	
5058		3.106	9	8	6.106	8.856 OK	
5059		3.130	9	8	6.130	8.880 OK	
5060		3.142	9	8	6.142	8.892 OK	
5061		3.166	9	8	6.166	8.916 OK	
5062		3.190	9	8	6.190	8.940 OK	
5063		3.202	9	8	6.202	8.952 OK	

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
CL Pier 4	5064	3.226	9	8	6.226	8.976	OK
	5065	3.250	9	8	6.250	9.000	OK
	5066	3.262	9	8	6.262	9.012	OK
	5067	3.286	9	8	6.286	9.036	OK
	5068	3.322	9	8	6.322	9.072	OK
	5069	3.358	9	8	6.358	9.108	OK
	5070	3.394	9	8	6.394	9.144	OK
	5071	3.430	9	8	6.430	9.180	OK
	5072	3.466	9	8	6.466	9.216	OK
	5073	3.538	9	8	6.538	9.288	OK
	5074	3.610	9	8	6.610	9.360	OK
	5075	3.694	9	8	6.694	9.444	OK
	5076	4.266	9	8	7.266	10.016	OK
	5077	4.552	9	8	7.552	10.302	OK
	5078	4.100	9	8	7.100	9.850	OK
	5079	4.112	9	8	7.112	9.862	OK
	5080	4.100	9	8	7.100	9.850	OK
	5081	4.088	9	8	7.088	9.838	OK
	5082	4.088	9	8	7.088	9.838	OK
	5083	4.064	9	8	7.064	9.814	OK
	5084	4.040	9	8	7.040	9.790	OK
	5085	4.028	9	8	7.028	9.778	OK
	5086	4.028	9	8	7.028	9.778	OK
	5087	4.040	9	8	7.040	9.790	OK
	5088	4.064	9	8	7.064	9.814	OK
	5089	2.912	9	8	5.912	8.662	OK
	5090	2.686	9	8	5.686	8.436	OK
	5091	2.734	9	8	5.734	8.484	OK
	5092	3.068	9	8	6.068	8.818	OK
	5093	3.140	9	8	6.140	8.890	OK
	5094	3.200	9	8	6.200	8.950	OK
	5095	3.510	9	8	6.510	9.260	OK
	5096	3.046	9	8	6.046	8.796	OK
	5097	3.082	9	8	6.082	8.832	OK
	5098	3.130	9	8	6.130	8.880	OK
	5099	3.154	9	8	6.154	8.904	OK
	5100	3.202	9	8	6.202	8.952	OK
CL Pier 5	5101	3.226	9	8	6.226	8.976	OK
	5102	3.262	9	8	6.262	9.012	OK
	5103	3.298	9	8	6.298	9.048	OK
	5104	3.310	9	8	6.310	9.060	OK
	5105	3.358	9	8	6.358	9.108	OK
	5106	3.394	9	8	6.394	9.144	OK
	5107	3.430	9	8	6.430	9.180	OK
	5108	3.478	9	8	6.478	9.228	OK
	5109	3.526	9	8	6.526	9.276	OK
	5110	3.824	9	8	6.824	9.574	OK
	5111	3.896	9	8	6.896	9.646	OK
	5112	3.980	9	8	6.980	9.730	OK
	5113	4.314	9	8	7.314	10.064	OK
	5114	3.886	9	8	6.886	9.636	OK
	5115	3.922	9	8	6.922	9.672	OK
	5116	4.696	9	8	7.696	10.446	OK
	5117	4.696	9	8	7.696	10.446	OK
	5118	4.672	9	8	7.672	10.422	OK
	5119	4.636	9	8	7.636	10.386	OK
	5120	4.576	9	8	7.576	10.326	OK
	5121	4.504	9	8	7.504	10.254	OK
	5122	4.432	9	8	7.432	10.182	OK
	5123	4.348	9	8	7.348	10.098	OK
	5124	4.288	9	8	7.288	10.038	OK
	5125	4.228	9	8	7.228	9.978	OK
	5126	4.192	9	8	7.192	9.942	OK
	5127	4.168	9	8	7.168	9.918	OK
	5128	4.156	9	8	7.156	9.906	OK
	5129	4.180	9	8	7.180	9.930	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	5130	3.716	9	8	6.716	9.466	OK
	5131	3.740	9	8	6.740	9.490	OK
	5132	3.764	9	8	6.764	9.514	OK
	5133	3.788	9	8	6.788	9.538	OK
	5134	4.050	9	8	7.050	9.800	OK
	5135	4.062	9	8	7.062	9.812	OK
	5136	4.074	9	8	7.074	9.824	OK
	5137	4.074	9	8	7.074	9.824	OK
	5138	4.086	9	8	7.086	9.836	OK
	5139	4.098	9	8	7.098	9.848	OK
CL Pier 6	5140	4.110	9	8	7.110	9.860	OK
	5141	4.110	9	8	7.110	9.860	OK
	5142	4.134	9	8	7.134	9.884	OK
	5143	4.146	9	8	7.146	9.896	OK
	5144	4.158	9	8	7.158	9.908	OK
	5145	4.182	9	8	7.182	9.932	OK
	5146	4.194	9	8	7.194	9.944	OK
	5147	4.218	9	8	7.218	9.968	OK
	5148	3.992	9	8	6.992	9.742	OK
	5149	4.028	9	8	7.028	9.778	OK
	5150	4.076	9	8	7.076	9.826	OK
	5151	4.136	9	8	7.136	9.886	OK
	5152	4.648	9	8	7.648	10.398	OK
	5153	4.660	9	8	7.660	10.410	OK
	5154	4.874	9	8	7.874	10.624	OK
	5155	4.814	9	8	7.814	10.564	OK
	5156	4.742	9	8	7.742	10.492	OK
	5157	4.658	9	8	7.658	10.408	OK
	5158	4.574	9	8	7.574	10.324	OK
	5159	4.490	9	8	7.490	10.240	OK
	5160	4.406	9	8	7.406	10.156	OK
	5161	4.346	9	8	7.346	10.096	OK
	5162	4.298	9	8	7.298	10.048	OK
	5163	4.524	9	8	7.524	10.274	OK
	5164	4.036	9	8	7.036	9.786	OK
	5165	4.322	9	8	7.322	10.072	OK
	5166	3.882	9	8	6.882	9.632	OK
	5167	3.930	9	8	6.930	9.680	OK
	5168	3.966	9	8	6.966	9.716	OK
	5169	4.002	9	8	7.002	9.752	OK
	5170	4.014	9	8	7.014	9.764	OK
	5171	4.038	9	8	7.038	9.788	OK
	5172	4.050	9	8	7.050	9.800	OK
	5173	4.074	9	8	7.074	9.824	OK
	5174	4.098	9	8	7.098	9.848	OK
	5175	4.098	9	8	7.098	9.848	OK
CL Pier 7	5176	4.110	9	8	7.110	9.860	OK
	5177	4.134	9	8	7.134	9.884	OK
	5178	4.146	9	8	7.146	9.896	OK
	5179	4.146	9	8	7.146	9.896	OK
	5180	4.138	9	8	7.138	9.888	OK
	5181	4.143	9	8	7.143	9.893	OK
	5182	4.180	9	8	7.180	9.930	OK
	5183	4.260	9	8	7.260	10.010	OK
	5184	4.269	9	8	7.269	10.019	OK
	5185	4.268	9	8	7.268	10.018	OK
	5186	4.262	9	8	7.262	10.012	OK
	5187	3.710	10	8	6.710	10.127	OK
	5188	3.607	10	8	6.607	10.357	OK
	5189	3.562	10	8	6.562	10.312	OK
	5190	3.221	10	8	6.221	9.971	OK
	5191	3.158	10	8	6.158	9.908	OK
	5192	3.108	10	8	6.108	9.858	OK
	5193	2.988	10	8	5.988	9.738	OK
	5194	2.868	10	8	5.868	9.618	OK
	5195	2.766	10	8	5.766	9.516	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)		
		5196	2.712	10	8	5.712	9.462	OK
		5197	2.648	10	8	5.648	9.398	OK
		5198	2.562	10	8	5.562	9.312	OK
		5199	2.482	10	8	5.482	9.232	OK
		5200	2.559	10	8	5.559	9.309	OK
		5201	2.802	10	8	5.802	9.552	OK
		5202	2.369	10	8	5.369	9.119	OK
		5203	2.358	10	8	5.358	9.108	OK
		5204	2.399	10	8	5.399	9.149	OK
		5205	2.249	10	8	5.249	8.999	OK
		5206	2.328	10	8	5.328	9.078	OK
		5207	2.373	10	8	5.373	9.123	OK
		5208	2.339	10	8	5.339	9.089	OK
		5209	2.377	10	8	5.377	9.127	OK
		5210	2.499	10	8	5.499	9.249	OK
		5211	2.541	10	8	5.541	9.291	OK
CL Pier 8		5212	2.560	10	8	5.560	9.310	OK
		5213	2.558	10	8	5.558	9.308	OK
		5214	2.587	10	8	5.587	9.337	OK
		5215	2.677	10	8	5.677	9.427	OK
		5216	2.667	10	8	5.667	9.417	OK
		5217	2.721	10	8	5.721	9.471	OK
		5218	2.776	10	8	5.776	9.526	OK
		5219	2.802	10	8	5.802	9.552	OK
		5220	2.777	10	8	5.777	9.527	OK
		5221	2.776	10	8	5.776	9.526	OK
		5222	2.832	10	8	5.832	9.582	OK
		5223	2.711	10	8	5.711	9.461	OK
		5224	3.032	10	8	6.032	9.782	OK
		5225	3.656	10	8	6.656	10.406	OK
		5226	2.582	10	8	5.582	9.332	OK
		5227	2.575	10	8	5.575	9.325	OK
		5228	2.481	10	8	5.481	9.231	OK
		5229	2.440	10	8	5.440	9.190	OK
		5230	2.358	10	8	5.358	9.108	OK
		5231	2.322	10	8	5.322	9.072	OK
		5232	2.310	10	8	5.310	9.060	OK
		5233	2.798	10	8	5.798	9.548	OK
		5234	2.798	10	8	5.798	9.548	OK
		5235	2.822	10	8	5.822	9.572	OK
		5236	2.834	10	8	5.834	9.584	OK
		5237	2.108	10	8	5.108	8.858	OK
		5238	2.120	10	8	5.120	8.870	OK
		5239	2.156	10	8	5.156	8.906	OK
		5240	2.216	10	8	5.216	8.966	OK
		5241	2.180	10	8	5.180	8.930	OK
		5242	2.192	10	8	5.192	8.942	OK
		5243	2.180	10	8	5.180	8.930	OK
		5244	2.168	10	8	5.168	8.918	OK
		5245	2.144	10	8	5.144	8.894	OK
		5246	2.120	10	8	5.120	8.870	OK
CL Pier 9		5247	2.096	10	7	5.096	8.846	OK
		5248	2.072	10	7	5.072	8.822	OK
		5249	2.036	10	7	5.036	8.786	OK

Clear to top of stud = 3.25 in

JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)		
	5250	2.012	10	7	5.012	8.762	OK
	5251	1.976	10	7	4.976	8.726	OK
	5252	1.952	10	7	4.952	8.702	OK
	5253	1.928	10	7	4.928	8.678	OK
	5254	1.916	10	7	4.916	8.666	OK
	5255	1.904	10	7	4.904	8.654	OK
	5256	1.868	10	7	4.868	8.618	OK
	5257	1.844	10	7	4.844	8.594	OK
	5258	1.820	10	7	4.820	8.570	OK
	5259	2.558	10	7	5.558	9.308	OK
	5260	2.534	10	7	5.534	9.284	OK
	5261	2.534	10	7	5.534	9.284	OK
	5262	2.522	10	7	5.522	9.272	OK
	5263	2.474	10	7	5.474	9.224	OK
	5264	2.414	10	7	5.414	9.164	OK
	5265	2.354	10	7	5.354	9.104	OK
	5266	2.294	10	7	5.294	9.044	OK
	5267	2.234	10	7	5.234	8.984	OK
	5268	2.174	10	7	5.174	8.924	OK
	5269	2.150	10	7	5.150	8.900	OK
	5270	2.126	10	7	5.126	8.876	OK
	5271	1.888	10	7	4.888	8.638	OK
	5272	1.900	10	7	4.900	8.650	OK
	5273	1.912	10	7	4.912	8.662	OK
	5274	1.948	10	7	4.948	8.698	OK
	5275	1.496	10	7	4.496	8.246	OK
	5276	1.556	10	7	4.556	8.306	OK
	5277	1.616	10	7	4.616	8.366	OK
	5278	1.664	10	7	4.664	8.414	OK
	5279	1.736	10	7	4.736	8.486	OK
	5280	1.784	10	7	4.784	8.534	OK
	5281	1.856	10	7	4.856	8.606	OK
	5282	1.940	10	7	4.940	8.690	OK
CL Pier 10	5283	3.024	9	7	6.024	8.774	OK
	5284	3.108	9	7	6.108	8.858	OK
	5285	3.168	9	8	6.168	8.918	OK
	5286	3.228	9	8	6.228	8.978	OK
	5287	3.288	9	8	6.288	9.038	OK
	5288	3.348	9	8	6.348	9.098	OK
	5289	3.360	9	8	6.360	9.110	OK
	5290	3.408	9	8	6.408	9.158	OK
	5291	3.456	9	8	6.456	9.206	OK
	5292	3.504	9	8	6.504	9.254	OK
	5293	3.540	9	8	6.540	9.290	OK
	5294	4.064	9	8	7.064	9.814	OK
	5295	4.100	9	8	7.100	9.850	OK
	5296	4.124	9	8	7.124	9.874	OK
	5297	4.136	9	8	7.136	9.886	OK
	5298	3.648	9	8	6.648	9.398	OK
	5299	3.660	9	8	6.660	9.410	OK
	5300	3.672	9	8	6.672	9.422	OK
	5301	3.684	9	8	6.684	9.434	OK
	5302	3.672	9	8	6.672	9.422	OK
	5303	3.648	9	8	6.648	9.398	OK
	5304	3.612	9	8	6.612	9.362	OK
	5305	3.576	9	8	6.576	9.326	OK
	5306	3.540	9	8	6.540	9.290	OK
	5307	3.492	9	8	6.492	9.242	OK
	5308	3.408	9	8	6.408	9.158	OK
	5309	3.348	9	8	6.348	9.098	OK
	5310	3.264	9	8	6.264	9.014	OK
	5311	3.180	9	8	6.180	8.930	OK
	5312	3.096	9	8	6.096	8.846	OK
CL Pier 11	5313	3.000	9	8	6.000	8.750	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	<u>Girder 4</u>						
Span 3	7000	3.750	9	8	6.750	9.500	OK
	7001	3.654	9	8	6.654	9.404	OK
	7002	3.558	9	8	6.558	9.308	OK
	7003	3.450	9	8	6.450	9.200	OK
	7004	3.354	9	8	6.354	9.104	OK
	7005	3.258	9	8	6.258	9.008	OK
	7006	3.186	9	8	6.186	8.936	OK
	7007	3.126	9	8	6.126	8.876	OK
	7008	3.066	9	8	6.066	8.816	OK
	7009	3.018	9	8	6.018	8.768	OK
	7010	2.994	9	8	5.994	8.744	OK
	7011	2.970	9	8	5.970	8.720	OK
	7012	2.958	9	8	5.958	8.708	OK
	7013	2.982	9	8	5.982	8.732	OK
	7014	3.006	9	8	6.006	8.756	OK
	7015	3.078	9	8	6.078	8.828	OK
	7016	3.376	9	8	6.376	9.126	OK
	7017	3.448	9	8	6.448	9.198	OK
	7018	3.532	9	8	6.532	9.282	OK
	7019	3.604	9	8	6.604	9.354	OK
	7020	3.676	9	8	6.676	9.426	OK
	7021	3.736	9	8	6.736	9.486	OK
	7022	3.772	9	8	6.772	9.522	OK
	7023	3.820	9	8	6.820	9.570	OK
	7024	3.868	9	8	6.868	9.618	OK
	7025	3.916	9	8	6.916	9.666	OK
	7026	3.952	9	8	6.952	9.702	OK
7027	4.000	9	8	7.000	9.750	OK	
CL Pier 3	7028	4.024	9	8	7.024	9.774	OK
	7029	4.060	9	8	7.060	9.810	OK
	7030	4.096	9	8	7.096	9.846	OK
	7031	4.132	9	8	7.132	9.882	OK
	7032	4.168	9	8	7.168	9.918	OK
	7033	4.216	9	8	7.216	9.966	OK
	7034	4.264	9	8	7.264	10.014	OK
	7035	4.300	9	8	7.300	10.050	OK
	7036	4.360	9	8	7.360	10.110	OK
	7037	4.420	9	8	7.420	10.170	OK
	7038	4.492	9	8	7.492	10.242	OK
	7039	4.576	9	8	7.576	10.326	OK
	7040	4.636	9	8	7.636	10.386	OK
	7041	4.648	9	8	7.648	10.398	OK
	7042	4.636	9	8	7.636	10.386	OK
	7043	4.576	9	8	7.576	10.326	OK
	7044	4.480	9	8	7.480	10.230	OK
	7045	4.384	9	8	7.384	10.134	OK
	7046	4.240	9	8	7.240	9.990	OK
	7047	4.120	9	8	7.120	9.870	OK
	7048	4.000	9	8	7.000	9.750	OK
	7049	3.892	9	8	6.892	9.642	OK
	7050	3.796	9	8	6.796	9.546	OK
	7051	3.724	9	8	6.724	9.474	OK
	7052	3.462	9	8	6.462	9.212	OK
	7053	3.986	9	8	6.986	9.736	OK
	7054	3.010	9	8	6.010	8.760	OK
	7055	3.046	9	8	6.046	8.796	OK
	7056	3.094	9	8	6.094	8.844	OK
	7057	3.118	9	8	6.118	8.868	OK
	7058	3.142	9	8	6.142	8.892	OK
	7059	3.166	9	8	6.166	8.916	OK
	7060	3.190	9	8	6.190	8.940	OK
	7061	3.214	9	8	6.214	8.964	OK
	7062	3.238	9	8	6.238	8.988	OK
	7063	3.238	9	8	6.238	8.988	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
CL Pier 4	7064	3.262	9	8	6.262	9.012	OK
	7065	3.286	9	8	6.286	9.036	OK
	7066	3.298	9	8	6.298	9.048	OK
	7067	3.322	9	8	6.322	9.072	OK
	7068	3.346	9	8	6.346	9.096	OK
	7069	3.370	9	8	6.370	9.120	OK
	7070	3.406	9	8	6.406	9.156	OK
	7071	3.418	9	8	6.418	9.168	OK
	7072	3.466	9	8	6.466	9.216	OK
	7073	3.526	9	8	6.526	9.276	OK
	7074	3.574	9	8	6.574	9.324	OK
	7075	3.646	9	8	6.646	9.396	OK
	7076	4.206	9	8	7.206	9.956	OK
	7077	4.480	9	8	7.480	10.230	OK
	7078	3.992	9	8	6.992	9.742	OK
	7079	3.992	9	8	6.992	9.742	OK
	7080	3.968	9	8	6.968	9.718	OK
	7081	3.932	9	8	6.932	9.682	OK
	7082	3.908	9	8	6.908	9.658	OK
	7083	3.860	9	8	6.860	9.610	OK
	7084	3.836	9	8	6.836	9.586	OK
	7085	3.800	9	8	6.800	9.550	OK
	7086	3.776	9	8	6.776	9.526	OK
	7087	3.776	9	8	6.776	9.526	OK
	7088	3.788	9	8	6.788	9.538	OK
	7089	2.758	9	8	5.758	8.508	OK
	7090	2.770	9	8	5.770	8.520	OK
	7091	2.818	9	8	5.818	8.568	OK
	7092	3.128	9	8	6.128	8.878	OK
	7093	3.200	9	8	6.200	8.950	OK
	7094	3.248	9	8	6.248	8.998	OK
	7095	3.546	9	8	6.546	9.296	OK
	7096	3.094	9	8	6.094	8.844	OK
	7097	3.118	9	8	6.118	8.868	OK
	7098	3.166	9	8	6.166	8.916	OK
	7099	3.190	9	8	6.190	8.940	OK
	7100	3.226	9	8	6.226	8.976	OK
CL Pier 5	7101	3.250	9	8	6.250	9.000	OK
	7102	3.286	9	8	6.286	9.036	OK
	7103	3.298	9	8	6.298	9.048	OK
	7104	3.334	9	8	6.334	9.084	OK
	7105	3.358	9	8	6.358	9.108	OK
	7106	3.406	9	8	6.406	9.156	OK
	7107	3.430	9	8	6.430	9.180	OK
	7108	3.454	9	8	6.454	9.204	OK
	7109	3.490	9	8	6.490	9.240	OK
	7110	3.788	9	8	6.788	9.538	OK
	7111	3.848	9	8	6.848	9.598	OK
	7112	3.920	9	8	6.920	9.670	OK
	7113	4.242	9	8	7.242	9.992	OK
	7114	3.802	9	8	6.802	9.552	OK
	7115	3.850	9	8	6.850	9.600	OK
	7116	4.612	9	8	7.612	10.362	OK
	7117	4.600	9	8	7.600	10.350	OK
	7118	4.576	9	8	7.576	10.326	OK
	7119	4.528	9	8	7.528	10.278	OK
	7120	4.468	9	8	7.468	10.218	OK
	7121	4.420	9	8	7.420	10.170	OK
	7122	4.336	9	8	7.336	10.086	OK
	7123	4.276	9	8	7.276	10.026	OK
	7124	4.216	9	8	7.216	9.966	OK
	7125	4.168	9	8	7.168	9.918	OK
	7126	4.132	9	8	7.132	9.882	OK
	7127	4.120	9	8	7.120	9.870	OK
	7128	4.120	9	8	7.120	9.870	OK
	7129	4.144	9	8	7.144	9.894	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	7130	3.704	9	8	6.704	9.454	OK
	7131	3.740	9	8	6.740	9.490	OK
	7132	3.776	9	8	6.776	9.526	OK
	7133	3.812	9	8	6.812	9.562	OK
	7134	4.074	9	8	7.074	9.824	OK
	7135	4.086	9	8	7.086	9.836	OK
	7136	4.098	9	8	7.098	9.848	OK
	7137	4.122	9	8	7.122	9.872	OK
	7138	4.134	9	8	7.134	9.884	OK
	7139	4.146	9	8	7.146	9.896	OK
CL Pier 6	7140	4.146	9	8	7.146	9.896	OK
	7141	4.158	9	8	7.158	9.908	OK
	7142	4.170	9	8	7.170	9.920	OK
	7143	4.182	9	8	7.182	9.932	OK
	7144	4.206	9	8	7.206	9.956	OK
	7145	4.218	9	8	7.218	9.968	OK
	7146	4.230	9	8	7.230	9.980	OK
	7147	4.254	9	8	7.254	10.004	OK
	7148	4.028	9	8	7.028	9.778	OK
	7149	4.064	9	8	7.064	9.814	OK
	7150	4.100	9	8	7.100	9.850	OK
	7151	4.148	9	8	7.148	9.898	OK
	7152	4.684	9	8	7.684	10.434	OK
	7153	4.684	9	8	7.684	10.434	OK
	7154	4.898	9	8	7.898	10.648	OK
	7155	4.838	9	8	7.838	10.588	OK
	7156	4.766	9	8	7.766	10.516	OK
	7157	4.682	9	8	7.682	10.432	OK
	7158	4.610	9	8	7.610	10.360	OK
	7159	4.526	9	8	7.526	10.276	OK
	7160	4.466	9	8	7.466	10.216	OK
	7161	4.382	9	8	7.382	10.132	OK
	7162	4.334	9	8	7.334	10.084	OK
	7163	4.560	9	8	7.560	10.310	OK
	7164	4.072	9	8	7.072	9.822	OK
	7165	4.358	9	8	7.358	10.108	OK
	7166	3.918	9	8	6.918	9.668	OK
	7167	3.966	9	8	6.966	9.716	OK
	7168	4.014	9	8	7.014	9.764	OK
	7169	4.050	9	8	7.050	9.800	OK
	7170	4.074	9	8	7.074	9.824	OK
	7171	4.098	9	8	7.098	9.848	OK
	7172	4.110	9	8	7.110	9.860	OK
	7173	4.134	9	8	7.134	9.884	OK
	7174	4.158	9	8	7.158	9.908	OK
	7175	4.170	9	8	7.170	9.920	OK
CL Pier 7	7176	4.170	9	8	7.170	9.920	OK
	7177	4.194	9	8	7.194	9.944	OK
	7178	4.206	9	8	7.206	9.956	OK
	7179	4.222	9	8	7.222	9.972	OK
	7180	4.214	9	8	7.214	9.964	OK
	7181	4.217	9	8	7.217	9.967	OK
	7182	4.233	9	8	7.233	9.983	OK
	7183	4.236	9	8	7.236	9.986	OK
	7184	4.240	9	8	7.240	9.990	OK
	7185	4.279	9	8	7.279	10.029	OK
	7186	4.360	9	8	7.360	10.110	OK
	7187	3.702	10	8	6.702	10.119	OK
	7188	3.606	10	8	6.606	10.356	OK
	7189	3.573	10	8	6.573	10.323	OK
	7190	3.250	10	8	6.250	10.000	OK
	7191	3.152	10	8	6.152	9.902	OK
	7192	3.050	10	8	6.050	9.800	OK
	7193	2.942	10	8	5.942	9.692	OK
	7194	2.824	10	8	5.824	9.574	OK
	7195	2.777	10	8	5.777	9.527	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	7196	2.731	10	8	5.731	9.481	OK
	7197	2.636	10	8	5.636	9.386	OK
	7198	2.565	10	8	5.565	9.315	OK
	7199	2.481	10	8	5.481	9.231	OK
	7200	2.459	10	8	5.459	9.209	OK
	7201	2.709	10	8	5.709	9.459	OK
	7202	2.197	10	8	5.197	8.947	OK
	7203	2.268	10	8	5.268	9.018	OK
	7204	2.336	10	8	5.336	9.086	OK
	7205	2.462	10	8	5.462	9.212	OK
	7206	2.509	10	8	5.509	9.259	OK
	7207	2.529	10	8	5.529	9.279	OK
	7208	2.517	10	8	5.517	9.267	OK
	7209	2.444	10	8	5.444	9.194	OK
	7210	2.447	10	8	5.447	9.197	OK
CL Pier 8	7211	2.461	10	8	5.461	9.211	OK
	7212	2.452	10	8	5.452	9.202	OK
	7213	2.448	10	8	5.448	9.198	OK
	7214	2.428	10	8	5.428	9.178	OK
	7215	2.411	10	8	5.411	9.161	OK
	7216	2.463	10	8	5.463	9.213	OK
	7217	2.460	10	8	5.460	9.210	OK
	7218	2.448	10	8	5.448	9.198	OK
	7219	2.486	10	8	5.486	9.236	OK
	7220	2.558	10	8	5.558	9.308	OK
	7221	2.565	10	8	5.565	9.315	OK
	7222	2.695	10	8	5.695	9.445	OK
	7223	2.830	10	8	5.830	9.580	OK
	7224	3.056	10	8	6.056	9.806	OK
	7225	3.518	10	8	6.518	10.268	OK
	7226	2.559	10	8	5.559	9.309	OK
	7227	2.496	10	8	5.496	9.246	OK
	7228	2.495	10	8	5.495	9.245	OK
	7229	2.430	10	8	5.430	9.180	OK
	7230	2.454	10	8	5.454	9.204	OK
	7231	2.406	10	8	5.406	9.156	OK
	7232	2.382	10	8	5.382	9.132	OK
	7233	2.882	10	8	5.882	9.632	OK
	7234	2.870	10	8	5.870	9.620	OK
	7235	2.870	10	8	5.870	9.620	OK
	7236	2.120	10	8	5.120	8.870	OK
	7237	2.132	10	8	5.132	8.882	OK
	7238	2.144	10	8	5.144	8.894	OK
	7239	2.144	10	8	5.144	8.894	OK
	7240	2.120	10	8	5.120	8.870	OK
	7241	2.144	10	8	5.144	8.894	OK
	7242	2.132	10	8	5.132	8.882	OK
	7243	2.120	10	8	5.120	8.870	OK
	7244	2.108	10	8	5.108	8.858	OK
CL Pier 9	7245	2.096	10	8	5.096	8.846	OK
	7246	2.084	10	7	5.084	8.834	OK
	7247	2.060	10	7	5.060	8.810	OK
	7248	2.012	10	7	5.012	8.762	OK
	7249	2.000	10	7	5.000	8.750	OK
	7250	1.952	10	7	4.952	8.702	OK
	7251	1.928	10	7	4.928	8.678	OK
	7252	1.892	10	7	4.892	8.642	OK
	7253	1.868	10	7	4.868	8.618	OK
	7254	1.844	10	7	4.844	8.594	OK
	7255	1.796	10	7	4.796	8.546	OK
	7256	1.772	10	7	4.772	8.522	OK
	7257	2.486	10	7	5.486	9.236	OK
	7258	2.462	10	7	5.462	9.212	OK
	7259	2.450	10	7	5.450	9.200	OK
	7260	2.438	10	7	5.438	9.188	OK
	7261	2.414	10	7	5.414	9.164	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	7262	2.378	10	7	5.378	9.128	OK
	7263	2.318	10	7	5.318	9.068	OK
	7264	2.270	10	7	5.270	9.020	OK
	7265	2.198	10	7	5.198	8.948	OK
	7266	2.162	10	7	5.162	8.912	OK
	7267	2.126	10	7	5.126	8.876	OK
	7268	2.114	10	7	5.114	8.864	OK
	7269	1.864	10	7	4.864	8.614	OK
	7270	1.888	10	7	4.888	8.638	OK
	7271	1.924	10	7	4.924	8.674	OK
	7272	1.472	10	7	4.472	8.222	OK
	7273	1.544	10	7	4.544	8.294	OK
	7274	1.580	10	7	4.580	8.330	OK
	7275	1.628	10	7	4.628	8.378	OK
	7276	1.676	10	7	4.676	8.426	OK
	7277	1.700	10	7	4.700	8.450	OK
	7278	1.772	10	7	4.772	8.522	OK
	7279	1.844	10	7	4.844	8.594	OK
	7280	1.916	10	7	4.916	8.666	OK
CL Pier 10	7281	2.000	10	7	5.000	8.750	OK
	7282	3.084	9	7	6.084	8.834	OK
	7283	3.144	9	8	6.144	8.894	OK
	7284	3.204	9	8	6.204	8.954	OK
	7285	3.264	9	8	6.264	9.014	OK
	7286	3.300	9	8	6.300	9.050	OK
	7287	3.348	9	8	6.348	9.098	OK
	7288	3.288	9	8	6.288	9.038	OK
	7289	3.444	9	8	6.444	9.194	OK
	7290	3.504	9	8	6.504	9.254	OK
	7291	3.540	9	8	6.540	9.290	OK
	7292	4.076	9	8	7.076	9.826	OK
	7293	4.088	9	8	7.088	9.838	OK
	7294	4.112	9	8	7.112	9.862	OK
	7295	4.136	9	8	7.136	9.886	OK
	7296	3.648	9	8	6.648	9.398	OK
	7297	3.660	9	8	6.660	9.410	OK
	7298	3.672	9	8	6.672	9.422	OK
	7299	3.672	9	8	6.672	9.422	OK
	7300	3.660	9	8	6.660	9.410	OK
	7301	3.636	9	8	6.636	9.386	OK
	7302	3.600	9	8	6.600	9.350	OK
	7303	3.564	9	8	6.564	9.314	OK
	7304	3.516	9	8	6.516	9.266	OK
	7305	3.468	9	8	6.468	9.218	OK
	7306	3.408	9	8	6.408	9.158	OK
	7307	3.336	9	8	6.336	9.086	OK
	7308	3.276	9	8	6.276	9.026	OK
	7309	3.192	9	8	6.192	8.942	OK
	7310	3.096	9	8	6.096	8.846	OK
CL Pier 11	7311	3.000	9	8	6.000	8.750	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	<u>Girder 5</u>						
Span 3	9000	3.750	9	8	6.750	9.500	OK
	9001	3.630	9	8	6.630	9.380	OK
	9002	3.522	9	8	6.522	9.272	OK
	9003	3.378	9	8	6.378	9.128	OK
	9004	3.246	9	8	6.246	8.996	OK
	9005	3.126	9	8	6.126	8.876	OK
	9006	3.006	9	8	6.006	8.756	OK
	9007	2.922	9	8	5.922	8.672	OK
	9008	2.850	9	8	5.850	8.600	OK
	9009	2.802	9	8	5.802	8.552	OK
	9010	2.766	9	8	5.766	8.516	OK
	9011	2.754	9	8	5.754	8.504	OK
	9012	2.766	9	8	5.766	8.516	OK
	9013	2.802	9	8	5.802	8.552	OK
	9014	2.862	9	8	5.862	8.612	OK
	9015	2.982	9	8	5.982	8.732	OK
	9016	3.292	9	8	6.292	9.042	OK
	9017	3.400	9	8	6.400	9.150	OK
	9018	3.520	9	8	6.520	9.270	OK
	9019	3.616	9	8	6.616	9.366	OK
	9020	3.712	9	8	6.712	9.462	OK
	9021	3.784	9	8	6.784	9.534	OK
	9022	3.832	9	8	6.832	9.582	OK
	9023	3.880	9	8	6.880	9.630	OK
	9024	3.928	9	8	6.928	9.678	OK
	9025	3.976	9	8	6.976	9.726	OK
	9026	4.024	9	8	7.024	9.774	OK
9027	4.048	9	8	7.048	9.798	OK	
CL Pier 3	9028	4.084	9	8	7.084	9.834	OK
	9029	4.108	9	8	7.108	9.858	OK
	9030	4.144	9	8	7.144	9.894	OK
	9031	4.180	9	8	7.180	9.930	OK
	9032	4.216	9	8	7.216	9.966	OK
	9033	4.252	9	8	7.252	10.002	OK
	9034	4.288	9	8	7.288	10.038	OK
	9035	4.336	9	8	7.336	10.086	OK
	9036	4.372	9	8	7.372	10.122	OK
	9037	4.420	9	8	7.420	10.170	OK
	9038	4.480	9	8	7.480	10.230	OK
	9039	4.528	9	8	7.528	10.278	OK
	9040	4.552	9	8	7.552	10.302	OK
	9041	4.564	9	8	7.564	10.314	OK
	9042	4.528	9	8	7.528	10.278	OK
	9043	4.444	9	8	7.444	10.194	OK
	9044	4.360	9	8	7.360	10.110	OK
	9045	4.240	9	8	7.240	9.990	OK
	9046	4.120	9	8	7.120	9.870	OK
	9047	4.000	9	8	7.000	9.750	OK
	9048	3.892	9	8	6.892	9.642	OK
	9049	3.808	9	8	6.808	9.558	OK
	9050	3.736	9	8	6.736	9.486	OK
	9051	3.700	9	8	6.700	9.450	OK
	9052	3.450	9	8	6.450	9.200	OK
	9053	3.986	9	8	6.986	9.736	OK
	9054	3.034	9	8	6.034	8.784	OK
	9055	3.082	9	8	6.082	8.832	OK
	9056	3.130	9	8	6.130	8.880	OK
	9057	3.166	9	8	6.166	8.916	OK
	9058	3.190	9	8	6.190	8.940	OK
	9059	3.214	9	8	6.214	8.964	OK
	9060	3.238	9	8	6.238	8.988	OK
	9061	3.274	9	8	6.274	9.024	OK
	9062	3.286	9	8	6.286	9.036	OK
	9063	3.310	9	8	6.310	9.060	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
CL Pier 4	9064	3.322	9	8	6.322	9.072	OK
	9065	3.334	9	8	6.334	9.084	OK
	9066	3.358	9	8	6.358	9.108	OK
	9067	3.370	9	8	6.370	9.120	OK
	9068	3.382	9	8	6.382	9.132	OK
	9069	3.418	9	8	6.418	9.168	OK
	9070	3.430	9	8	6.430	9.180	OK
	9071	3.454	9	8	6.454	9.204	OK
	9072	3.466	9	8	6.466	9.216	OK
	9073	3.502	9	8	6.502	9.252	OK
	9074	3.538	9	8	6.538	9.288	OK
	9075	3.574	9	8	6.574	9.324	OK
	9076	4.098	9	8	7.098	9.848	OK
	9077	4.348	9	8	7.348	10.098	OK
	9078	3.824	9	8	6.824	9.574	OK
	9079	3.788	9	8	6.788	9.538	OK
	9080	3.728	9	8	6.728	9.478	OK
	9081	3.680	9	8	6.680	9.430	OK
	9082	3.620	9	8	6.620	9.370	OK
	9083	3.572	9	8	6.572	9.322	OK
	9084	3.512	9	8	6.512	9.262	OK
	9085	3.476	9	8	6.476	9.226	OK
	9086	3.452	9	8	6.452	9.202	OK
	9087	3.452	9	8	6.452	9.202	OK
	9088	3.464	9	8	6.464	9.214	OK
	9089	2.782	9	8	5.782	8.532	OK
	9090	2.806	9	8	5.806	8.556	OK
	9091	2.866	9	8	5.866	8.616	OK
	9092	3.188	9	8	6.188	8.938	OK
	9093	3.248	9	8	6.248	8.998	OK
	9094	3.308	9	8	6.308	9.058	OK
	9095	3.606	9	8	6.606	9.356	OK
	9096	3.142	9	8	6.142	8.892	OK
	9097	3.166	9	8	6.166	8.916	OK
	9098	3.202	9	8	6.202	8.952	OK
	9099	3.238	9	8	6.238	8.988	OK
	9100	3.262	9	8	6.262	9.012	OK
	9101	3.286	9	8	6.286	9.036	OK
CL Pier 5	9102	3.310	9	8	6.310	9.060	OK
	9103	3.334	9	8	6.334	9.084	OK
	9104	3.346	9	8	6.346	9.096	OK
	9105	3.382	9	8	6.382	9.132	OK
	9106	3.418	9	8	6.418	9.168	OK
	9107	3.442	9	8	6.442	9.192	OK
	9108	3.466	9	8	6.466	9.216	OK
	9109	3.490	9	8	6.490	9.240	OK
	9110	3.788	9	8	6.788	9.538	OK
	9111	3.824	9	8	6.824	9.574	OK
	9112	3.872	9	8	6.872	9.622	OK
	9113	4.170	9	8	7.170	9.920	OK
	9114	3.718	9	8	6.718	9.468	OK
	9115	3.718	9	8	6.718	9.468	OK
	9116	4.480	9	8	7.480	10.230	OK
	9117	4.456	9	8	7.456	10.206	OK
	9118	4.396	9	8	7.396	10.146	OK
	9119	4.360	9	8	7.360	10.110	OK
	9120	4.300	9	8	7.300	10.050	OK
	9121	4.228	9	8	7.228	9.978	OK
	9122	4.180	9	8	7.180	9.930	OK
	9123	4.120	9	8	7.120	9.870	OK
	9124	4.084	9	8	7.084	9.834	OK
	9125	4.060	9	8	7.060	9.810	OK
	9126	4.048	9	8	7.048	9.798	OK
	9127	4.048	9	8	7.048	9.798	OK
	9128	4.072	9	8	7.072	9.822	OK
	9129	4.108	9	8	7.108	9.858	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	9130	3.656	9	8	6.656	9.406	OK
	9131	3.704	9	8	6.704	9.454	OK
	9132	3.752	9	8	6.752	9.502	OK
	9133	3.788	9	8	6.788	9.538	OK
	9134	4.062	9	8	7.062	9.812	OK
	9135	4.074	9	8	7.074	9.824	OK
	9136	4.110	9	8	7.110	9.860	OK
	9137	4.122	9	8	7.122	9.872	OK
	9138	4.146	9	8	7.146	9.896	OK
	9139	4.158	9	8	7.158	9.908	OK
CL Pier 6	9140	4.170	9	8	7.170	9.920	OK
	9141	4.182	9	8	7.182	9.932	OK
	9142	4.206	9	8	7.206	9.956	OK
	9143	4.230	9	8	7.230	9.980	OK
	9144	4.242	9	8	7.242	9.992	OK
	9145	4.278	9	8	7.278	10.028	OK
	9146	4.290	9	8	7.290	10.040	OK
	9147	4.314	9	8	7.314	10.064	OK
	9148	4.088	9	8	7.088	9.838	OK
	9149	4.124	9	8	7.124	9.874	OK
	9150	4.160	9	8	7.160	9.910	OK
	9151	4.196	9	8	7.196	9.946	OK
	9152	4.708	9	8	7.708	10.458	OK
	9153	4.708	9	8	7.708	10.458	OK
	9154	4.910	9	8	7.910	10.660	OK
	9155	4.850	9	8	7.850	10.600	OK
	9156	4.766	9	8	7.766	10.516	OK
	9157	4.694	9	8	7.694	10.444	OK
	9158	4.610	9	8	7.610	10.360	OK
	9159	4.538	9	8	7.538	10.288	OK
	9160	4.478	9	8	7.478	10.228	OK
	9161	4.430	9	8	7.430	10.180	OK
	9162	4.394	9	8	7.394	10.144	OK
	9163	4.644	9	8	7.644	10.394	OK
	9164	4.156	9	8	7.156	9.906	OK
	9165	4.454	9	8	7.454	10.204	OK
	9166	4.014	9	8	7.014	9.764	OK
	9167	4.074	9	8	7.074	9.824	OK
	9168	4.110	9	8	7.110	9.860	OK
	9169	4.146	9	8	7.146	9.896	OK
	9170	4.170	9	8	7.170	9.920	OK
	9171	4.194	9	8	7.194	9.944	OK
	9172	4.206	9	8	7.206	9.956	OK
	9173	4.230	9	8	7.230	9.980	OK
	9174	4.242	9	8	7.242	9.992	OK
	9175	4.254	9	8	7.254	10.004	OK
CL Pier 7	9176	4.266	9	8	7.266	10.016	OK
	9177	4.278	9	8	7.278	10.028	OK
	9178	4.290	9	8	7.290	10.040	OK
	9179	4.310	9	8	7.310	10.060	OK
	9180	4.337	9	8	7.337	10.087	OK
	9181	4.339	9	8	7.339	10.089	OK
	9182	4.359	9	8	7.359	10.109	OK
	9183	4.356	9	8	7.356	10.106	OK
	9184	4.385	9	8	7.385	10.135	OK
	9185	4.387	9	8	7.387	10.137	OK
	9186	4.395	9	8	7.395	10.145	OK
	9187	3.733	10	8	6.733	10.149	OK
	9188	3.625	10	8	6.625	10.375	OK
	9189	3.597	10	8	6.597	10.347	OK
	9190	3.237	10	8	6.237	9.987	OK
	9191	3.140	10	8	6.140	9.890	OK
	9192	3.036	10	8	6.036	9.786	OK
	9193	2.939	10	8	5.939	9.689	OK
	9194	2.840	10	8	5.840	9.590	OK
	9195	2.748	10	8	5.748	9.498	OK

Clear to top of stud = 3.25 in

	JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)	
	9196	2.654	10	8	5.654	9.404	OK
	9197	2.567	10	8	5.567	9.317	OK
	9198	2.508	10	8	5.508	9.258	OK
	9199	2.358	10	8	5.358	9.108	OK
	9200	2.354	10	8	5.354	9.104	OK
	9201	2.621	10	8	5.621	9.371	OK
	9202	2.000	10	8	5.000	8.750	OK
	9203	2.126	10	8	5.126	8.876	OK
	9204	2.354	10	8	5.354	9.104	OK
	9205	2.484	10	8	5.484	9.234	OK
	9206	2.570	10	8	5.570	9.320	OK
	9207	2.597	10	8	5.597	9.347	OK
	9208	2.567	10	8	5.567	9.317	OK
	9209	2.463	10	8	5.463	9.213	OK
	9210	2.452	10	8	5.452	9.202	OK
CL Pier 8	9211	2.393	10	8	5.393	9.143	OK
	9212	2.308	10	8	5.308	9.058	OK
	9213	2.289	10	8	5.289	9.039	OK
	9214	2.283	10	8	5.283	9.033	OK
	9215	2.288	10	8	5.288	9.038	OK
	9216	2.263	10	8	5.263	9.013	OK
	9217	2.265	10	8	5.265	9.015	OK
	9218	2.309	10	8	5.309	9.059	OK
	9219	2.357	10	8	5.357	9.107	OK
	9220	2.367	10	8	5.367	9.117	OK
	9221	2.469	10	8	5.469	9.219	OK
	9222	2.618	10	8	5.618	9.368	OK
	9223	2.805	10	8	5.805	9.555	OK
	9224	2.949	10	8	5.949	9.699	OK
	9225	3.359	10	8	6.359	10.109	OK
	9226	2.408	10	8	5.408	9.158	OK
	9227	2.458	10	8	5.458	9.208	OK
	9228	2.428	10	8	5.428	9.178	OK
	9229	2.518	10	8	5.518	9.268	OK
	9230	2.490	10	8	5.490	9.240	OK
	9231	2.466	10	8	5.466	9.216	OK
	9232	2.942	10	8	5.942	9.692	OK
	9233	2.942	10	8	5.942	9.692	OK
	9234	2.930	10	8	5.930	9.680	OK
	9235	2.180	10	8	5.180	8.930	OK
	9236	2.180	10	8	5.180	8.930	OK
	9237	2.180	10	8	5.180	8.930	OK
	9238	2.180	10	8	5.180	8.930	OK
	9239	2.180	10	8	5.180	8.930	OK
	9240	2.168	10	8	5.168	8.918	OK
	9241	2.168	10	8	5.168	8.918	OK
	9242	2.168	10	8	5.168	8.918	OK
	9243	2.144	10	8	5.144	8.894	OK
	9244	2.120	10	8	5.120	8.870	OK
	9245	2.096	10	8	5.096	8.846	OK
	9246	2.084	10	8	5.084	8.834	OK
CL Pier 9	9247	2.048	10	7	5.048	8.798	OK
	9248	2.012	10	7	5.012	8.762	OK
	9249	1.988	10	7	4.988	8.738	OK
	9250	1.952	10	7	4.952	8.702	OK
	9251	1.904	10	7	4.904	8.654	OK
	9252	1.868	10	7	4.868	8.618	OK
	9253	1.868	10	7	4.868	8.618	OK
	9254	1.832	10	7	4.832	8.582	OK
	9255	1.772	10	7	4.772	8.522	OK
	9256	1.724	10	7	4.724	8.474	OK
	9257	1.688	10	7	4.688	8.438	OK
	9258	2.414	10	7	5.414	9.164	OK
	9259	2.378	10	7	5.378	9.128	OK
	9260	2.354	10	7	5.354	9.104	OK
	9261	2.354	10	7	5.354	9.104	OK

Clear to top of stud = 3.25 in

JOINT	Final Haunch at CL Girder above flange (in)	Slab Thickness (in)	Stud Height (in)	Stud Min (in)	Stud Max (in)		
	9262	2.318	10	7	5.318	9.068	OK
	9263	2.282	10	7	5.282	9.032	OK
	9264	2.246	10	7	5.246	8.996	OK
	9265	2.210	10	7	5.210	8.960	OK
	9266	2.162	10	7	5.162	8.912	OK
	9267	2.162	10	7	5.162	8.912	OK
	9268	2.162	10	7	5.162	8.912	OK
	9269	1.912	10	7	4.912	8.662	OK
	9270	1.924	10	7	4.924	8.674	OK
	9271	1.448	10	7	4.448	8.198	OK
	9272	1.496	10	7	4.496	8.246	OK
	9273	1.520	10	7	4.520	8.270	OK
	9274	1.568	10	7	4.568	8.318	OK
	9275	1.652	10	7	4.652	8.402	OK
	9276	1.676	10	7	4.676	8.426	OK
	9277	1.712	10	7	4.712	8.462	OK
	9278	1.772	10	7	4.772	8.522	OK
	9279	1.856	10	7	4.856	8.606	OK
	9280	1.940	10	7	4.940	8.690	OK
CL Pier 10	9281	2.012	10	7	5.012	8.762	OK
	9282	2.096	10	7	5.096	8.846	OK
	9283	3.168	9	8	6.168	8.918	OK
	9284	3.228	9	8	6.228	8.978	OK
	9285	3.288	9	8	6.288	9.038	OK
	9286	3.336	9	8	6.336	9.086	OK
	9287	3.360	9	8	6.360	9.110	OK
	9288	3.408	9	8	6.408	9.158	OK
	9289	3.444	9	8	6.444	9.194	OK
	9290	3.492	9	8	6.492	9.242	OK
	9291	3.540	9	8	6.540	9.290	OK
	9292	4.052	9	8	7.052	9.802	OK
	9293	4.064	9	8	7.064	9.814	OK
	9294	4.076	9	8	7.076	9.826	OK
	9295	4.100	9	8	7.100	9.850	OK
	9296	3.600	9	8	6.600	9.350	OK
	9297	3.612	9	8	6.612	9.362	OK
	9298	3.612	9	8	6.612	9.362	OK
	9299	3.612	9	8	6.612	9.362	OK
	9300	3.600	9	8	6.600	9.350	OK
	9301	3.576	9	8	6.576	9.326	OK
	9302	3.552	9	8	6.552	9.302	OK
	9303	3.516	9	8	6.516	9.266	OK
	9304	3.468	9	8	6.468	9.218	OK
	9305	3.432	9	8	6.432	9.182	OK
	9306	3.372	9	8	6.372	9.122	OK
	9307	3.312	9	8	6.312	9.062	OK
	9308	3.240	9	8	6.240	8.990	OK
	9309	3.180	9	8	6.180	8.930	OK
	9310	3.096	9	8	6.096	8.846	OK
	9311	3.024	9	8	6.024	8.774	OK
CL Pier 11	9312	3.000	9	8	6.000	8.750	OK