11CDH-00000-00054
PHASE 1: SINGLE FAMILY DWELLING AND GRADING
2825 PADARO LANE
SUMMERLAND, SANTA BARBARA COUNTY, CA

SANTA BARBARA COUNTY BUILDING & SAFETY DIVISION GRADING NOTES

1. ALL GRADING SHALL CONFORM TO COUNTY OF SANTA BARBARA ORDINANCE NO. 4473 AND STANDARDS, REQUIREMENTS PERTAINING THERETO, THESE CONSTRUCTION DOCUMENTS, ANY CONSTRUCTION RECOMMENDATIONS BY THE PROJECT SOILS ENGINEER OR ENGINEERING GEOLOGIST, THE CONDITIONS OF APPROVAL AND THE PERMIT CONDITIONS.

2. CONTRACTOR SHALL NOTIFY THE COUNTY GRADING INSPECTOR AND THE PROJECT ENGINEER AT LEAST 48 HOURS BEFORE START OF ANY GRADING WORK. THEY SHALL BE NOTIFIED OF THE TIME AND LOCATION OF THE PRE-CONSTRUCTION CONFERENCE.

3. THE CONTRACTOR SHALL EMPLOY ALL LABOR, EQUIPMENT AND METHODS REQUIRED TO PREVENT HIS OPERATIONS FROM PRODUCING DUST IN AMOUNTS DAMAGING TO ADJACENT PROPERTY, CULTIVATED VEGETATION AND DOMESTIC ANIMALS OR CAUSING A NUISANCE TO PERSONS OCCUPYING BUILDINGS IN THE VICINITY OF THE JOB SITE. CONTRACTOR SHALL BE RESPONSIBLE FOR ANY DAMAGE CAUSED BY DUST RESULTING FROM GRADING OPERATIONS.

4. BEFORE BEGINNING WORK REQUIRING EXPORTING OR IMPORTING OF MATERIALS, THE CONTRACTOR SHALL OBTAIN APPROVAL FROM PUBLIC WORKS ROAD DIVISION FOR HAUL ROUTES USED AND METHODS PROVIDED TO MINIMIZE DEPOSIT OF SOILS ON COUNTY ROADS. GRADING/ROAD INSPECTORS SHALL MONITOR THIS REQUIREMENT WITH THE CONTRACTOR.

5. THE SOILS ENGINEER SHALL PROVIDE OBSERVATION AND TESTING DURING GRADING OPERATIONS IN THE FIELD AND SHALL SUBMIT A FINAL REPORT TO THE COUNTY OF SANTA BARBARA SAFETY DIVISION AND PUBLIC WORKS INSPECTOR STATING THAT ALL EARTHWORK WAS PROPERLY COMPLETED AND IS IN SUBSTANTIAL CONFORMANCE WITH THE REQUIREMENTS OF THE GRADING ORDINANCE. SOIL TESTS SHALL BE CONDUCTED AT NOT LESS THAN ONE TEST FOR EACH 18-INCHES OF FILL AND/OR FOR EACH 500 CUBIC YARDS OF FILL.

6. AREAS TO BE GRADED SHALL BE CLEARED OF ALL VEGETATION, INCLUDING ROOTS AND ROOT STRUCTURES, AND OTHER UNSUITABLE MATERIAL FOR A STRUCTURAL FILL, THEN SCARIFIED TO A DEPTH OF 6" PRIOR TO PLACING OF ANY FILL. ALL UNSUITABLE MATERIAL SHALL BE REMOVED FROM THE PROJECT SITE AND TRANSPORTED TO A SUITABLE DISPOSAL AREA. PRIOR TO PLACING ANY FILL MATERIAL, THE AREA SHALL BE INSPECTED BY THE COUNTY PUBLIC WORKS INSPECTOR (ALLOW 48 HOUR MINIMUM ADVANCED NOTICE).

7. A THOROUGH SEARCH SHALL BE MADE FOR ALL ABANDONED MAN-MADE FACILITIES SUCH AS SEPTIC TANK SYSTEMS, FUEL OR WATER STORAGE TANKS, AND PIPELINES OR CONDUITS. ANY SUCH FACILITIES ENCOUNTERED SHALL BE REMOVED UNLESS OTHERWISE ALLOWED BY THE PROJECT ENGINEER AND THE SOILS ENGINEER. PIPELINES OR CONDUITS ALLOWED TO BE ABANDONED-IN-PLACE SHALL BE CRUSHED OR SHALL HAVE ALL EXPOSED OPENINGS PLUGGED WITH STIFF CONCRETE RODDED TO REMOVE VOIDS WITHIN THE PIPELINE/CONDUIT TO A MINIMUM OF 5 LINEAL FEET BEYOND THE OPENING, UNDER THE OBSERVATION OF THE SOILS ENGINEER. IF THE ABANDONED FACILITIES ARE REMOVED THEN THE DEPRESSIONS SHALL BE PROPERLY FILLED AND COMPACTED UNDER OBSERVATION OF THE SOILS ENGINEER.

8. AREAS WITH EXISTING SLOPES WHICH ARE TO RECEIVE FILL MATERIAL SHALL BE KEYED AND BENCHED. THE DESIGN AND INSTALLATION OF THE KEYWAY SHALL BE PER THE GEOTECHNICAL ENGINEER'S RECOMMENDATION OR PER COUNTY STANDARD DETAIL #G-13.

9. FILL MATERIAL SHALL BE SPREAD IN LIFTS NOT EXCEEDING 6-INCHES IN COMPACTED THICKNESS, MOISTENED OR DRIED AS NECESSARY TO NEAR OPTIMUM MOISTURE CONTENT AND COMPACTED BY AN APPROVED METHOD. FILL MATERIAL NEAR OR BELOW STRUCTURES SHALL BE COMPACTED TO A MINIMUM OF 90% MAXIMUM DRY DENSITY AS DETERMINED BY A.S.T.M. D-1557-91 MODIFIED PROCTOR (AASHO) TEST OR SIMILAR APPROVED METHODS. SOME FILL AREAS MAY REQUIRE COMPACTION TO A GREATER DENSITY AS CALLED FOR IN CONSTRUCTION DOCUMENTS. NUMBER OF SOIL TESTS REQUIRED: 1 TEST PER EACH 18 INCHES OF FILL, BUT NOT LESS THAN 1 TEST PER 500 CUBIC YARDS OF FILL AND AT LEAST 1 TEST EACH AREA RECEIVING FILL.

10. CUT SLOPES SHALL NOT EXCEED A GRADE OF 2 HORIZONTAL TO 1 VERTICAL. FILL AND COMBINATION FILL AND CUT SLOPES SHALL NOT EXCEED 2 HORIZONTAL TO 1 VERTICAL. SLOPES OVER 3 FEET IN VERTICAL HEIGHT SHALL BE PLANTED WITH APPROVED PERENNIAL VEGETATION TO BE DENSE AND GROWING PRIOR TO FINAL INSPECTION OR TREATED WITH EQUALLY APPROVED EROSION CONTROL MEASURES PRIOR TO FINAL INSPECTION.

11. SURFACE DRAINAGE SHALL NOT BE LESS THAN 1% EXCEPT FOR PAVED SURFACES. A MINIMUM OF 2% FOR FIVE (5) FEET AWAY FROM THE FOUNDATION LINE OF ANY BUILDING OR STRUCTURE IS REQUIRED.

12. ALL TREES NOT DESIGNATED TO BE REMOVED AND TO REMAIN ON SITE SHALL BE PROTECTED FROM DAMAGE BY TEMPORARY FENCING AROUND THE DRIPLINE DURING GRADING OPERATION.

GENERAL GRADING NOTES

1. GRADING SUPERVISION REQUIREMENTS SHALL BE COMPLIED WITH AS FOLLOWS:

   A. THE PROJECT ENGINEER SHALL BE A REPRESENTATIVE OF PENFIELD & SMITH.

   B. LINE AND GRADE STAKES SHALL SET BY THE SURVEYORS UNDER THE GENERAL SUPERVISION OF THE PROJECT ENGINEER. THE PROJECT ENGINEER SHALL PROVIDE GENERAL CONSTRUCTION REVIEW.

   C. THE SOILS ENGINEER SHALL PROVIDE GENERAL REVIEW OF THE GRADING AND SUBGRADE PREPARATION AND PERFORM COMPACTION TESTING AS NECESSARY TO ENSURE QUALITY CONSTRUCTION AND COMPLY WITH THE GRADING ORDINANCE.

   D. THE SOILS ENGINEER SHALL PROVIDE GENERAL REVIEW OF THE GRADING AND SUBGRADE PREPARATION, PERFORM COMPACTION TESTING, PERFORM 'R' VALUE TESTING, RECOMMEND THE STRUCTURAL SECTION FOR THE PRIVATE STREET CONSTRUCTION, MEASURE THE THICKNESS OF PAVEMENT AND BASE DURING CONSTRUCTION, TEST AND REVIEW THE QUALITY OF BASE, ETC. REFERENCE THE PRELIMINARY FOUNDATION INVESTIGATION PREPARED BY EARTH SYSTEMS SOUTHERN CALIFORNIA.

   E. UPON COMPLETION OF CONSTRUCTION, THE PROJECT ENGINEER SHALL PREPARE RECORD DRAWINGS AND SUBMIT A REPORT INDICATING THAT THE IMPROVEMENTS HAVE BEEN COMPLETED IN SUBSTANTIAL CONFORMANCE WITH THE APPROVED PLANS AND SPECIFICATIONS.

2. IN ADDITION TO THESE NOTES, ALL REQUIREMENTS CONTAINED IN THE SOILS REPORT PREPARED FOR THIS PROJECT BY EARTH SYSTEMS SOUTHERN CALIFORNIA SHALL BE CONFORMED TO.

3. UNDERGROUND SERVICE ALERT (U.S.A.) SHALL BE CONTACTED AT (800) 422-4133, FORTY-EIGHT (48) HOURS PRIOR TO START OF ANY GRADING OPERATIONS.

4. PRIOR TO ANY CONSTRUCTION, A GRADING PERMIT SHALL BE OBTAINED FROM THE SANTA BARBARA COUNTY PLANNING AND DEVELOPMENT GRADING DIVISION.

5. NOISE GENERATING CONSTRUCTION ACTIVITIES SHALL BE LIMITED TO THE HOURS OF 7:00 AM TO 7:00 PM, MONDAY THROUGH FRIDAY. CONSTRUCTION EQUIPMENT MAINTENANCE SHALL BE LIMITED TO THE SAME HOURS. STATIONARY CONSTRUCTION EQUIPMENT THAT GENERATES NOISE WHICH EXCEEDS 65 dB AT THE PROJECT BOUNDARIES SHALL BE SHIELDED TO THE COUNTY'S SATISFACTION AND SHALL BE LOCATED AT A MINIMUM OF 50 FEET FROM OCCUPIED RESIDENCES.

6. STONES LARGER THAN 6 INCHES IN DIAMETER SHALL NOT BE PLACED IN THE FILL, AND NO STONES LARGER THAN 3 INCHES IN DIAMETER BEING PLACED IN THE UPPER THREE FEET OF FILL. STONES LESS THAN 6 INCHES IN DIAMETER SHALL BE THOROUGHLY MIXED WITH THE SOIL, IN SUCH A MANNER THAT NO VOIDS IN THE FILL ARE CREATED.

7. EARTH MOVING AND WORKING OPERATIONS SHALL BE CONTROLLED TO PREVENT WATER FROM RUNNING INTO EXCAVATED AREAS. EXCESS WATER SHALL BE PROMPTLY REMOVED AND THE SITE KEPT DRY. FILL MATERIAL SHALL NOT BE PLACED, SPREAD, OR ROLLED DURING UNFAVORABLE WEATHER CONDITIONS. WHEN THE WORK IS INTERRUPTED BY HEAVY RAIN, FILL OPERATIONS SHALL NOT BE RESUMED UNTIL FIELD TESTS BY THE SOILS ENGINEER INDICATE THAT THE MOISTURE CONTENT AND DENSITY OF THE FILL ARE ABLE TO BE PLACED AND MEET THE REQUIRED COMPACTION.

8. WHEN THE MOISTURE CONTENT OF THE FILL MATERIAL IS NOT SUFFICIENT TO ACHIEVE REQUIRED COMPACTION, WATER SHALL BE ADDED UNTIL THE SOILS ATTAIN A MOISTURE CONTENT SO THAT THOROUGH BONDING IS ACHIEVED DURING THE COMPACTING PROCESS. WHEN THE MOISTURE CONTENT OF THE FILL MATERIAL IS EXCESSIVE, THE FILL MATERIAL SHALL BE AERATED BY BLADING OR OTHER SATISFACTORY METHODS UNTIL THE MOISTURE CONTENT IS REDUCED TO AN ACCEPTABLE CONTENT TO ACHIEVE PROPER COMPACTION.

9. IMPORT SOILS SHALL BE GRANULAR NON-EXPANSIVE SOILS WHICH ARE EQUAL TO OR SUPERIOR IN QUALITY TO THE ON SITE SOILS AS DETERMINED BY THE SOILS ENGINEER PRIOR TO IMPORTATION OF THE FILL MATERIAL TO THE SITE. THE SOILS SHALL HAVE A MINIMUM 'R' VALUE OF 20 WHEN PROPOSED FOR ROADWAY SUPPORT.

10. IMPORT OR ON-SITE SOILS USED IN FILL OPERATIONS SHALL BE FREE FROM ORGANIC MATERIAL AND OTHER DELETERIOUS MATERIALS. DURING GRADING OPERATIONS THE SOILS ENGINEER SHALL PERIODICALLY EXAMINE THE SOILS FOR ORGANIC CONTENT; AND IF AN EXCESS ORGANIC CONTENT IS FOUND IN THE FILL SOIL THEY MAY ISSUE A WRITTEN NOTICE OF NONCOMPLIANCE AND NOTIFY THE COUNTY.

11. COMPRESSIBLE SURFICIAL SOILS SHOULD BE REMOVED AND RECOMPACTED WHERE WALLS ARE PLANNED FOR THE PROJECT. THE REMOVAL AND RECOMPACTION SHOULD EXTEND TO A MINIMUM DEPTH OF TWO FEET BELOW THE BOTTOM OF THE WALL FOOTING. THE SOILS ENGINEER SHALL APPROVE THE SUBGRADE PRIOR TO CONSTRUCTION OF THE FOOTING. SEE SOILS REPORT FOR ADDITIONAL INFORMATION.

12. THE COMPACTION STANDARD SHALL BE THE ASTM D 1557-78 METHOD OF COMPACTION.

13. REMOVED SOIL, IF FREE FROM DELETERIOUS MATERIAL MAY BE PLACED IN LIFTS NOT EXCEEDING 8 INCHES IN DEPTH, BROUGHT TO NEAR OPTIMUM MOISTURE CONTENT AND COMPACTED TO A MINIMUM OF 90% RELATIVE COMPACTION.

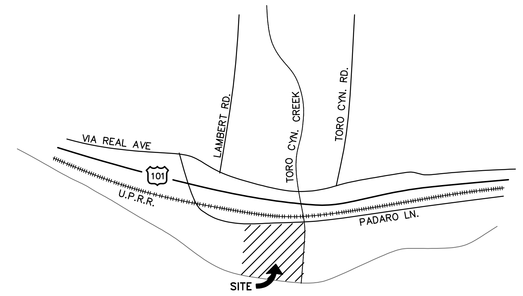
14. IN PATIO AREAS AND WALKWAYS, THE TOP 12 INCHES OF SUBGRADE SOILS SHALL BE REMOVED AND COMPACTED TO A MINIMUM OF 90% RELATIVE COMPACTION PRIOR TO FILL PLACEMENT.

15. IN STREETS AND DRIVEWAYS AND/OR PARKING AREAS, THE TOP 12 INCHES OF SUBGRADE SOILS SHALL BE REMOVED AND COMPACTED TO A MINIMUM OF 95% RELATIVE COMPACTION.

KEY MAP
SCALE: 1" = 50'

SHEET INDEX

1. TITLE & NOTES
2. GRADING PLAN
3. CROSS SECTIONS AND DETAILS



VICINITY MAP
N.T.S.

SURVEYOR'S NOTES

1. BOUNDARY

THE BOUNDARY INFORMATION SHOWN HEREON WAS COMPILED FROM RECORD DATA, AND IS FOR INFORMATIONAL PURPOSES ONLY. THIS SURVEY TIED TO SEVERAL MONUMENTS OF RECORD IN ORDER TO ORIENT THE TOPOGRAPHIC AND PLANIMETRIC MAPPING TO THE COMPILED BOUNDARY. THIS MAP DOES NOT REPRESENT A BOUNDARY ESTABLISHMENT SURVEY.

2. MAPPING

TOPOGRAPHIC MAPPING WAS COMPILED AT A SCALE OF 1"=40', WITH A 1 FOOT CONTOUR INTERVAL, USING STANDARD PHOTOGRAMMETRIC METHODS AND PROCEDURES BY ARROWHEAD MAPPING CORPORATION, FROM AERIAL PHOTOGRAPHY AUGUST 30, 2006.

MAPPING IS SUPPLEMENTED BY DATA COLLECTED IN A FIELD SURVEY USING CONVENTIONAL EQUIPMENT AND PROCEDURES IN DECEMBER, 2010,

AERIAL PHOTOGRAPHY

THE AERIAL PHOTOGRAPHY USED AS THE BACKGROUND FOR THIS MAP WAS OBTAINED ON AUGUST 30, 2006 BY ARROWHEAD MAPPING CORPORATION. THE PHOTOGRAPHY HAS BEEN CONVERTED INTO A DIGITAL FORMAT AND CORRECTED FOR HORIZONTAL AND VERTICAL DISTORTION USING STANDARD PHOTOGRAMMETRIC METHODS.

3. BASIS OF BEARINGS

THE BASIS OF BEARINGS FOR THIS SURVEY IS **SOUTH 88°53'18" EAST** FOR A PORTION OF THE NORTHERLY BOUNDARY LINE OF PARCEL "A" AS SHOWN ON PARCEL MAP RECORDED IN BOOK 29, PAGE 72-73 IN THE OFFICE OF THE COUNTY SURVEYOR IN THE COUNTY OF SANTA BARBARA, CALIFORNIA.

4. VERTICAL DATUM

THE ELEVATIONS SHOWN HEREON ARE NAVD88, BASED UPON TIES TO STATION 05-01, BEING A BRASS DISK SET IN MONUMENT WELL, MARKED "HPGN 05-01 1990", REFERENCE NATIONAL GEODETIC SURVEY DATASHEET PID "EW9544" FOR STATION LOCATION.

5. SITE INFORMATION:

APN: 005-260-018, COUNTY OF SANTA BARBARA

PROJECT CONTACTS

OWNER: 3282 BEACHCLUB FAMILY TRUST

ARCHITECT: MARK WRYAN
MARK WRYAN DESIGN, LLC
PO BOX 1231
PACIFIC PALISADES, CA 90272
(917) 647-4635

ENGINEER: PETER NOSTRAND
PENFIELD & SMITH
111 E. VICTORIA STREET
SANTA BARBARA, CA 93101
(805) 963-9532

LEGEND

EXISTING ROCKS
PROPOSED ROCKS
PROPERTY BOUNDARY
71' BLUFF RETREAT AND COASTAL COMMISSION FACTOR OF SAFETY SETBACK
BLUFF RETREAT SETBACK
PROPOSED MAJOR CONTOUR 35
EXISTING MINOR CONTOUR 35
PROPOSED COUNTOUR PARCEL B 35
EXISTING CONTOUR 35
EXISTING TREE 13" EUC
PROPOSED CATCH BASIN
PROPOSED AREA DRAIN
PROPOSED STORM DRAIN MANHOLE
EXISTING UTILITY POLE UP
PROPOSED STORM DRAIN SD
PROPOSED FLOWLINE
EXISTING FLOWLINE
PROPOSED FENCE
EXISTING WATERLINE W
EXISTING OVERHEAD WIRE OHW
PROPOSED SEWER S
PROPOSED WALL

ABBREVIATIONS

EG	EXISTING GRADE
FF	FINISH FLOOR
FG	FINISH GRADE
FL	FLOWLINE
HP	HIGH POINT
INV	INVERT

NO.	DATE	REVISIONS	APPD.

Penfield & Smith
Engineering · Surveying · Planning · Construction Management ·
111 East Victoria Street, Santa Barbara, CA 93101
Phone: (805) 963-9532 Fax: (805) 966-9801

DESIGN ALD CHECKED PEN

PETER E. NOSTRAND
PROJECT ENGINEER
R.C.E. 39811

REGISTERED PROFESSIONAL ENGINEER PETER E. NOSTRAND NO 39811 CIVIL STATE OF CALIFORNIA

COUNTY OF SANTA BARBARA, CA
REVIEWED BY:
SIGNATURE DATE

TITLE SHEET
11CDH-00000-00054
PH 1: SINGLE FAMILY DWELLING AND GRADING
2825 PADARO LANE, SUMMERLAND, SANTA BARBARA COUNTY, CA

P&S PROJECT NO. 17189.03
SHEET 1 OF 3
PLAN DATE 11/5/2013

48-ENG SAVE DATE: 11/12/2013 3:48:49 PM PLOT BY: Josh Jenson PLOT DATE: 11/12/2013 3:48:17 PM PLOT SCALE: 1:1

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