White Sands Missile Range, New Mexico, Parts of Dona Ana, Lincoln, Otero, Sierra and Socorro Counties
Table H.--Engineering Index Properties

| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| Ac: | | | | | | | | | | | | |
| Active Dune Land | 0-3 | Fine sand | SM, SP-SM | A-2, A-3 | 0 | 0 | 100 | 95-100 | 75-95 | 5-15 | --- | NP |
| | 3-60 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |
| AD: | | | | | | | | | | | | |
| Anklam---------- | 0-3 | Very gravelly sandy loam | GM, SM | A-1 | 0-5 | 5-10 | 50-70 | 20-50 | 15-35 | 10-20 | 20-25 | NP-5 |
| | 3-17 | Very gravelly clay loam | SC | A-2 | 0-5 | 10-15 | 55-75 | 35-50 | 30-50 | 20-35 | 35-40 | 10-15 |
| | 17-21 | Weathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Aladdin--------- | 0-7 | Gravelly loamy sand | SM | A-1, A-2 | --- | 0-5 | 70-90 | 50-75 | 30-60 | 15-25 | --- | NP |
| | 7-60 | Gravelly sandy loam, gravelly fine sandy loam, gravelly loam | CL-ML, ML, SC-SM, SM | A-1, A-2, A-4 | --- | 0-5 | 70-90 | 50-75 | 25-65 | 15-55 | 20-30 | NP-10 |
| BD: | | | | | | | | | | | | |
| Berino---------- | 0-10 | Sandy loam | SM | A-2, A-4 | 0 | 0 | 95-100 | 95-100 | 60-95 | 30-50 | 15-20 | NP-5 |
| | 10-22 | Sandy clay loam, sandy loam, loam | CL, CL-ML, SC, SC-SM | A-4, A-6 | 0 | 0 | 95-100 | 95-100 | 65-80 | 35-60 | 20-35 | 5-15 |
| | 22-44 | Sandy clay loam, sandy loam | CL, CL-ML, SC, SC-SM | A-4, A-6 | 0 | 0 | 95-100 | 95-100 | 65-80 | 35-55 | 20-35 | 5-15 |
| | 44-60 | Loamy sand | SM | A-2 | 0 | 0 | 95-100 | 95-100 | 55-75 | 15-25 | --- | NP |
| Dona Ana-------- | 0-4 | Sandy loam | SM | A-2, A-4 | 0 | 0 | 95-100 | 90-100 | 60-85 | 30-50 | 15-25 | NP-5 |
| | 4-36 | Sandy clay | SC, SC-SM | A-4, A-6 | 0 | 0 | 95-100 | 90-100 | 80-90 | 35-50 | 25-35 | 5-15 |

Table H.--Engineering Index Properties

| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| BD: continued | | | | | | | | | | | | |
| Dona Ana | | loam, sandy loam, loam | | | | | | | | | | |
| | 36-60 | Sandy loam, sandy clay loam, fine sandy loam | SC-SM | A-2, A-4 | 0 | 0 | 95-100 | 90-100 | 60-80 | 30-50 | 20-30 | 5-10 |
| Do: | | | | | | | | | | | | |
| Deama---------- | 0-7 | Very stony loam | CL, GC, SC | A-6 | --- | 35-50 | 60-80 | 55-75 | 50-70 | 40-60 | 25-35 | 10-15 |
| | 7-10 | Very stony loam, very cobbly loam, very stony silt loam | CL, GC, SC | A-6 | --- | 35-50 | 60-80 | 55-75 | 50-70 | 40-65 | 25-35 | 10-15 |
| | 10-14 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Rock Outcrop---- | 0-60 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| DP: | | | | | | | | | | | | |
| Dona Ana-------- | 0-4 | Sandy loam | SM | A-2, A-4 | 0 | 0 | 95-100 | 90-100 | 60-85 | 30-50 | 15-25 | NP-5 |
| | 4-36 | Sandy clay loam, sandy loam, loam | SC, SC-SM | A-4, A-6 | 0 | 0 | 95-100 | 90-100 | 80-90 | 35-50 | 25-35 | 5-15 |
| | 36-60 | Sandy loam, sandy clay loam, fine sandy loam | SC-SM | A-2, A-4 | 0 | 0 | 95-100 | 90-100 | 60-80 | 30-50 | 20-30 | 5-10 |
| Pajarito-------- | 0-5 | Sandy loam | SM | A-2, A-4 | 0 | 0 | 100 | 100 | 85-100 | 30-45 | 15-20 | NP-5 |
| | 5-60 | Fine sandy loam, sandy loam | SM | A-2, A-4 | 0 | 0 | 90-100 | 85-100 | 60-100 | 25-45 | 15-20 | NP-5 |

White Sands Missile Range, New Mexico, Parts of Dona Ana, Lincoln, Otero, Sierra and Socorro Counties
Table H.--Engineering Index Properties

| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| DP: continued | | | | | | | | | | | | |
| Bluepoint------- | 0-36 | Loamy fine sand | SM | A-2, A-4 | 0 | 0 | 100 | 100 | 75-85 | 25-45 | --- | NP |
| | 36-60 | Stratified fine sand to gravelly loamy fine sand | SM | A-2 | 0 | 0 | 70-100 | 60-90 | 55-85 | 10-30 | --- | NP |
| Du: | | | | | | | | | | | | |
| Dune Land------- | 0-6 | Fine sand | SM, SP, SP-SM | A-2, A-3 | 0 | 0 | 100 | 100 | 60-80 | 0-25 | --- | NP |
| | 6-60 | Sand, fine sand | SM, SP, SP-SM | A-2, A-3 | 0 | 0 | 100 | 100 | 50-80 | 0-25 | --- | NP |
| Dona Ana-------- | 0-4 | Sandy loam | SM | A-2, A-4 | 0 | 0 | 95-100 | 90-100 | 60-85 | 30-50 | 15-25 | NP-5 |
| | 4-36 | Sandy clay loam, sandy loam, loam | SC, SC-SM | A-4, A-6 | 0 | 0 | 95-100 | 90-100 | 80-90 | 35-50 | 25-35 | 5-15 |
| | 36-60 | Sandy loam, sandy clay loam, fine sandy loam | SC-SM | A-2, A-4 | 0 | 0 | 95-100 | 90-100 | 60-80 | 30-50 | 20-30 | 5-10 |
| Bluepoint------- | 0-36 | Loamy fine sand | SM | A-2, A-4 | 0 | 0 | 100 | 100 | 75-85 | 25-45 | --- | NP |
| | 36-60 | Stratified fine sand to gravelly loamy fine sand | SM | A-2 | 0 | 0 | 70-100 | 60-90 | 55-85 | 10-30 | --- | NP |
| DY: | | | | | | | | | | | | |
| Dune Land------- | 0-3 | Fine sand | SM, SP, SP-SM | A-2, A-3 | 0 | 0 | 100 | 100 | 60-80 | 0-25 | --- | NP |
| | 3-60 | Sand, fine sand | SM, SP, SP-SM | A-3, A-2 | 0 | 0 | 100 | 100 | 50-80 | 0-25 | --- | NP |
| Yesum---------- | 0-3 | Very fine sandy loam | ML | A-4 | 0 | 0 | 100 | 95-100 | 85-95 | 50-65 | --- | NP |
| | 3-65 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |

White Sands Missile Range, New Mexico, Parts of Dona Ana, Lincoln, Otero, Sierra and Socorro Counties
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| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| Gr: | | | | | | | | | | | | |
| Gilland--------- | 0-7 | Very stony loam | GC-GM, SC-SM | A-2 | --- | 30-50 | 35-75 | 30-70 | 30-45 | 25-35 | 20-30 | 5-10 |
| | 7-28 | Very stony loam, very stony clay loam | GC, SC | A-2, A-6 | --- | 30-50 | 35-75 | 30-70 | 30-50 | 25-40 | 25-35 | 10-20 |
| | 28-48 | Weathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| | 48-52 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Rock Outcrop---- | 0-60 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Gs: | | | | | | | | | | | | |
| Gypsum Land----- | 0-60 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Gu: | | | | | | | | | | | | |
| Gypsum Land----- | 0-60 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Gv: | | | | | | | | | | | | |
| Gypsum Rock Land | 0-60 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Tanbark--------- | 0-2 | Gravelly loam | CL, GC, SC | A-6 | 0 | 0 | 55-80 | 50-75 | 45-65 | 40-60 | 25-35 | 10-15 |
| | 2-13 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |
| | 13-17 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |

White Sands Missile Range, New Mexico, Parts of Dona Ana, Lincoln, Otero, Sierra and Socorro Counties
Table H.--Engineering Index Properties

| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| InT: | | | | | | | | | | | | |
| Intermittent Lakes---------- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| LA: | | | | | | | | | | | | |
| La Fonda-------- | 0-6 | Loam | CL | A-6 | 0 | 0 | 100 | 100 | 85-95 | 60-75 | 30-35 | 10-15 |
| | 6-60 | Loam, clay loam, sandy clay loam | CL | A-6 | 0 | 0 | 95-100 | 95-100 | 85-95 | 60-85 | 25-40 | 10-20 |
| La Fonda-------- | 0-6 | Loam | CL | A-6 | 0 | 0 | 100 | 100 | 85-95 | 60-75 | 30-35 | 10-15 |
| | 6-60 | Loam, clay loam, sandy clay loam | CL | A-6 | 0 | 0 | 95-100 | 95-100 | 85-95 | 60-85 | 25-40 | 10-20 |
| Lf: | | | | | | | | | | | | |
| Lava Flows------ | 0-60 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Lr: | | | | | | | | | | | | |
| Lozier---------- | 0-14 | Stony loam | CL, GC, SC | A-2, A-4, A-6, A-7-6 | 3-30 | 0-20 | 40-80 | 30-70 | 25-65 | 20-55 | 25-48 | 8-26 |
| | 14-18 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Rock Outcrop---- | 0-60 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| MA: | | | | | | | | | | | | |
| Marcial--------- | 0-6 | Silty clay loam | CL | A-6 | 0 | 0 | 100 | 100 | 95-100 | 85-95 | 30-40 | 10-20 |
| | 6-38 | Silty clay, clay, silty clay loam | CH, CL | A-6, A-7 | 0 | 0 | 100 | 100 | 90-100 | 80-95 | 35-60 | 15-40 |

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| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| MA: continued | | | | | | | | | | | | |
| Marcial | 38-52 | Silty clay loam, silt loam, clay | CL | A-6 | 0 | 0 | 100 | 100 | 90-100 | 80-95 | 25-40 | 10-20 |
| | 52-60 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Ubar---------- | 0-2 | Silt loam | CL | A-6 | 0 | 0 | 100 | 100 | 85-100 | 60-85 | 30-35 | 10-15 |
| | 2-60 | Silty clay loam, silty clay, clay | CH, CL | A-7 | 0 | 0 | 100 | 100 | 90-100 | 70-95 | 40-60 | 15-30 |
| Me: | | | | | | | | | | | | |
| Mead---------- | 0-5 | Clay loam | CL | A-6, A-7 | 0 | 0 | 95-100 | 75-100 | 70-85 | 50-60 | 35-45 | 15-20 |
| | 5-60 | Clay, silty clay | CH, CL, MH | A-7 | 0 | 0 | 100 | 100 | 95-100 | 85-95 | 45-65 | 20-30 |
| MG: | | | | | | | | | | | | |
| Mimbres--------- | 0-3 | Silt loam | CL | A-6 | 0 | 0 | 100 | 100 | 95-100 | 70-90 | 25-35 | 10-15 |
| | 3-60 | Silty clay loam, silt loam, clay loam | CL | A-6 | 0 | 0 | 100 | 100 | 95-100 | 75-95 | 25-40 | 10-20 |
| Glendale-------- | 0-6 | Silt loam | CL | A-6 | 0 | 0 | 100 | 100 | 95-100 | 80-90 | 30-40 | 15-25 |
| | 6-72 | Silt loam, clay loam, silty clay loam | CL | A-6 | 0 | 0 | 100 | 100 | 95-100 | 75-90 | 30-40 | 15-25 |
| NT: | | | | | | | | | | | | |
| Nickel---------- | 0-3 | Gravelly fine sandy loam | GM, SM | A-1, A-2 | 0 | 0-10 | 60-75 | 55-70 | 30-45 | 20-35 | 20-30 | NP-5 |
| | 3-26 | Gravelly loam, very gravelly | GC-GM, SC-SM | A-2, A-4 | 0 | 10-15 | 45-75 | 40-70 | 30-50 | 20-40 | 25-30 | 5-10 |

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|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| NT: continued | | | | | | | | | | | | |
| Nickel | | loam, gravelly fine sandy loam | | | | | | | | | | |
| | 26-60 | Very gravelly loam, very gravelly sandy loam, extremely gravelly loam | GC-GM, GP-GC | A-2 | 0 | 10-15 | 20-60 | 15-55 | 10-40 | 5-30 | 25-30 | 5-10 |
| Tencee---------- | 0-3 | Very gravelly loam | GC-GM | A-2 | --- | 10-15 | 35-60 | 30-55 | 25-40 | 20-35 | 25-30 | 5-10 |
| | 3-12 | Very gravelly sandy loam, very gravelly loam | GC-GM | A-2 | --- | 10-15 | 35-60 | 30-55 | 20-40 | 15-30 | 20-25 | 5-10 |
| | 12-27 | Indurated | | | --- | --- | --- | --- | --- | --- | --- | --- |
| | 27-60 | Variable | | | --- | --- | --- | --- | --- | --- | --- | --- |
| OB: | | | | | | | | | | | | |
| Onite---------- | 0-12 | Loamy fine sand | SM | A-2 | 0 | 0 | 80-100 | 75-100 | 65-80 | 25-35 | --- | NP |
| | 12-60 | Sandy loam, gravelly sandy loam | SC-SM | A-2, A-4 | 0 | 0 | 75-100 | 70-100 | 55-75 | 25-40 | 20-25 | 5-10 |
| Bluepoint------- | 0-9 | Fine sand | SM | A-2, A-4 | 0 | 0 | 100 | 100 | 75-85 | 25-45 | --- | NP |
| | 9-60 | Loamy fine sand, loamy sand, fine sand | SM | A-2, A-4 | 0 | 0 | 100 | 100 | 65-85 | 25-45 | --- | NP |
| Wink---------- | 0-8 | Loamy fine sand | SC-SM, SM | A-2-4 | 0 | 0-5 | 90-100 | 85-100 | 80-100 | 15-35 | 15-25 | NP-6 |
| | 8-60 | Fine sandy loam, loam, sandy loam | SC-SM, SM | A-2-4, A-4 | 0 | 0-5 | 90-100 | 85-100 | 80-100 | 25-45 | 17-25 | 3-7 |

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| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| Os: | | | | | | | | | | | | |
| Oscura---------- | 0-10 | Silty clay | CH, CL | A-7 | 0 | 0 | 100 | 100 | 90-100 | 80-95 | 45-55 | 20-30 |
| | 10-22 | Stratified clay to very fine sandy loam | CL | A-6, A-7 | 0 | 0 | 100 | 100 | 70-85 | 55-75 | 35-45 | 15-20 |
| | 22-60 | Clay, silty clay, silty clay loam | CH, CL | A-7 | 0 | 0 | 100 | 100 | 90-100 | 80-95 | 40-55 | 15-30 |
| RK: | | | | | | | | | | | | |
| Rockland Cool--- | 0-60 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Rubble Land----- | 0-60 | Fragmental material | GP | A-1 | 50-60 | 20-30 | 0-10 | 0-5 | 0-5 | 0 | --- | NP |
| Deama---------- | 0-7 | Very stony loam | CL, GC, SC | A-6 | --- | 35-50 | 60-80 | 55-75 | 50-70 | 40-60 | 25-35 | 10-15 |
| | 7-10 | Very stony loam, very cobbly loam, very stony silt loam | CL, GC, SC | A-6 | --- | 35-50 | 60-80 | 55-75 | 50-70 | 40-65 | 25-35 | 10-15 |
| | 10-14 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| RL: | | | | | | | | | | | | |
| Rock Land------- | 0-60 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Rubble Land----- | 0-60 | Fragmental material | GP | A-1 | 50-60 | 20-30 | 0-10 | 0-5 | 0-5 | 0 | --- | NP |
| Lozier---------- | 0-10 | Stony loam | CL, GC, SC | A-2, A-4, A-6, A-7-6 | 3-30 | 0-20 | 40-80 | 30-70 | 25-65 | 20-55 | 25-48 | 8-26 |
| | 10-14 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |

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| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| SH: | | | | | | | | | | | | |
| Rubble Land----- | 0-60 | Fragmental material | GP | A-1 | 50-60 | 20-30 | 0-10 | 0-5 | 0-5 | 0 | --- | NP |
| Shale Rock Land- | 0-60 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Deama---------- | 0-7 | Very stony loam | CL, GC, SC | A-6 | --- | 35-50 | 60-80 | 55-75 | 50-70 | 40-60 | 25-35 | 10-15 |
| | 7-10 | Very stony loam, very cobbly loam, very stony silt loam | CL, GC, SC | A-6 | --- | 35-50 | 60-80 | 55-75 | 50-70 | 40-65 | 25-35 | 10-15 |
| | 10-14 | Unweathered bedrock | | | --- | --- | --- | --- | --- | --- | --- | --- |
| SP: | | | | | | | | | | | | |
| Sonoita--------- | 0-5 | Gravelly sandy loam | SM | A-1, A-2 | --- | 0-5 | 70-75 | 65-75 | 40-60 | 20-30 | 15-25 | NP-5 |
| | 5-50 | Gravelly sandy loam, fine sandy loam, sandy loam | SC-SM | A-2 | --- | 0-5 | 70-95 | 65-95 | 40-65 | 20-35 | 20-30 | 5-10 |
| | 50-60 | Gravelly sandy clay loam | SC | A-2, A-6 | --- | 0-5 | 70-80 | 65-75 | 30-60 | 20-50 | 20-30 | 10-15 |
| Pinaleno-------- | 0-3 | Gravelly sandy loam | GM, SM | A-1, A-2 | --- | 0-10 | 55-80 | 50-75 | 35-50 | 20-30 | 20-25 | NP-5 |
| | 3-29 | Very gravelly sandy loam, very gravelly sandy clay loam, very | GC-GM | A-1, A-2 | --- | 0-20 | 30-55 | 25-50 | 15-45 | 10-25 | 20-30 | 5-10 |

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| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| SP: continued | | gravelly loam | | | | | | | | | | |
| Pinaleno | 29-60 | Very gravelly sandy loam | GM | A-1 | --- | 0-20 | 30-55 | 25-50 | 15-35 | 10-20 | 15-20 | NP-5 |
| Aladdin--------- | 0-7 | Gravelly loamy sand | SM | A-1, A-2 | --- | 0-5 | 70-90 | 50-75 | 30-60 | 15-25 | --- | NP |
| | 7-60 | Gravelly sandy loam, gravelly fine sandy loam, gravelly loam | CL-ML, ML, SC-SM, SM | A-1, A-2, A-4 | --- | 0-5 | 70-90 | 50-75 | 25-65 | 15-55 | 20-30 | NP-10 |
| SR: | | | | | | | | | | | | |
| Sotim---------- | 0-4 | Clay loam | CL | A-6 | 0 | 0 | 95-100 | 95-100 | 80-100 | 60-85 | 35-40 | 15-20 |
| | 4-50 | Clay loam, loam | CL | A-6 | 0 | 0 | 95-100 | 95-100 | 80-100 | 60-80 | 25-40 | 10-20 |
| | 50-60 | Gravelly sandy loam, gravelly fine sandy loam | SM | A-2, A-4 | 0 | 0 | 75-85 | 70-80 | 45-70 | 25-45 | 15-20 | NP-5 |
| Russler--------- | 0-4 | Silt loam | CL | A-6 | 0 | 0 | 100 | 100 | 90-100 | 70-85 | 25-35 | 10-15 |
| | 4-14 | Loam, silt loam, fine sandy loam | CL, SC | A-6 | 0 | 0 | 95-100 | 90-100 | 75-95 | 45-75 | 25-35 | 10-15 |
| | 14-50 | Loam, fine sandy loam, sandy loam | CL-ML, SC, SC-SM | A-2, A-4, A-6 | 0 | 0 | 95-100 | 90-100 | 60-85 | 30-60 | 25-35 | 5-15 |
| | 50-60 | Very gravelly sand | GP | A-1 | 0 | 0 | 30-40 | 25-35 | 10-20 | 0-5 | --- | NP |
| TC: | | | | | | | | | | | | |
| Tencee---------- | 0-3 | Very gravelly loam | GC-GM | A-2 | --- | 10-15 | 35-60 | 30-55 | 25-40 | 20-35 | 25-30 | 5-10 |

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| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| TC: continued | | | | | | | | | | | | |
| Tencee | 3-12 | Very gravelly sandy loam, very gravelly loam | GC-GM | A-2 | --- | 10-15 | 35-60 | 30-55 | 20-40 | 15-30 | 20-25 | 5-10 |
| | 12-27 | Indurated | | | --- | --- | --- | --- | --- | --- | --- | --- |
| | 27-60 | Variable | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Nickel---------- | 0-3 | Gravelly fine sandy loam | GM, SM | A-1, A-2 | 0 | 0-10 | 60-75 | 55-70 | 30-45 | 20-35 | 20-30 | NP-5 |
| | 3-26 | Gravelly loam, very gravelly loam, gravelly fine sandy loam | GC-GM, SC-SM | A-2, A-4 | 0 | 10-15 | 45-75 | 40-70 | 30-50 | 20-40 | 25-30 | 5-10 |
| | 26-60 | Very gravelly loam, very gravelly sandy loam, extremely gravelly loam | GC-GM, GP-GC | A-2 | 0 | 10-15 | 20-60 | 15-55 | 10-40 | 5-30 | 25-30 | 5-10 |
| TK: | | | | | | | | | | | | |
| Tencee---------- | 0-3 | Very gravelly loam | GC-GM | A-2 | --- | 10-15 | 35-60 | 30-55 | 25-40 | 20-35 | 25-30 | 5-10 |
| | 3-12 | Very gravelly sandy loam, very gravelly loam | GC-GM | A-2 | --- | 10-15 | 35-60 | 30-55 | 20-40 | 15-30 | 20-25 | 5-10 |
| | 12-27 | Indurated | | | --- | --- | --- | --- | --- | --- | --- | --- |
| | 27-60 | Variable | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Nickel---------- | 0-3 | Gravelly fine sandy loam | GM, SM | A-1, A-2 | 0 | 0-10 | 60-75 | 55-70 | 30-45 | 20-35 | 20-30 | NP-5 |

White Sands Missile Range, New Mexico, Parts of Dona Ana, Lincoln, Otero, Sierra and Socorro Counties
Table H.--Engineering Index Properties

| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |
| TK: continued | | | | | | | | | | | | |
| Nickel | 3-26 | Gravelly loam, very gravelly loam, gravelly fine sandy loam | GC-GM, SC-SM | A-2, A-4 | 0 | 10-15 | 45-75 | 40-70 | 30-50 | 20-40 | 25-30 | 5-10 |
| | 26-60 | Very gravelly loam, very gravelly sandy loam, extremely gravelly loam | GC-GM, GP-GC | A-2 | 0 | 10-15 | 20-60 | 15-55 | 10-40 | 5-30 | 25-30 | 5-10 |
| Ye: | | | | | | | | | | | | |
| Yesum---------- | 0-3 | Very fine sandy loam | ML | A-4 | 0 | 0 | 100 | 95-100 | 85-95 | 50-65 | --- | NP |
| | 3-65 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |
| YH: | | | | | | | | | | | | |
| Yesum---------- | 0-3 | Very fine sandy loam | ML | A-4 | 0 | 0 | 100 | 95-100 | 85-95 | 50-65 | --- | NP |
| | 3-65 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Holloman-------- | 0-16 | Very fine sandy loam | CL | A-6 | 0 | 0 | 100 | 95-100 | 75-90 | 60-75 | 25-35 | 10-15 |
| | 16-20 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |
| Gypsum Land----- | 0-60 | Gypsiferous material | | | --- | --- | --- | --- | --- | --- | --- | --- |

(Absence of an entry indicates that the data were not estimated.)

| Map symbol and soil name | Depth | USDA texture | Classification | | Fragments | | Percentage passing sieve number-- | | | | Liquid limit | Plas-ticity index |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Unified | AASHTO | >10 inches | 3-10 inches | 4 | 10 | 40 | 200 | | |
| | In | | | | Pct | Pct | | | | | Pct | |

## Engineering Index Properties

### General

This table gives estimates of the engineering classification and of the range of index properties for the major layers of each soil in the survey areas. Most soils have layers of contrasting properties within the upper 5 to 6 feet. Information in this table includes depth, USDA texture, Unified and AASHTO Classification, rock fragments larger than 3 inches, percentage passing designated sieves, liquid limit, and plasticity index.

### Properties

Depth to the upper and lower boundaries of each layer is indicated.

Texture is given in the standard terms used by the USDA. The terms are defined according to percentages of sand, silt, and clay in the fraction of the soil that is less than 2 millimeters in diameter. (Textural terms are defined in Chapter 4, Soil Survey Manual or in the glossary of most soil survey reports) If the content of particles coarser than sand is 15 percent or more, an appropriate modifier is added, for example, "gravelly".

Unified classification system classifies soils according to properties that affect their use as construction material. Soils are classified according to grain-size distribution of the fraction less than 3 inches in diameter and according to plasticity index, liquid limit, and organic matter content.

AASHTO classification is the system adopted by the American Association of State Highway and Transportation Officials. It classifies soils according to those properties that affect roadway construction.

Rock fragments, 3 to 10 inches and greater than 10 inches in diameter, are indicated as a percentage of the total soil in on a dry-weight basis. The percentages are estimates determined mainly by converting volume percentage in the field to weight percentage.

Percentage (of soil particles) passing designated sieves is the percentage of the soil fraction less than 3 inches in diameter based on an ovendry weight. The sieves, numbers 4, 10, 40, and 200, have openings of 4.76, 2.00, 0.420, and 0.074 millimeters, respectively. Estimates are based on laboratory tests of soils sampled in the survey area and in nearby areas and on estimates made in the field.

Liquid limit and plasticity index (Atterbery limits) indicate the plasticity characteristics of a soil. The estimates are based on test data from the survey area, or from nearby areas, and on field examination.