

Lake Merritt Station Area Plan (LMSAP)

Water Demand Estimate Summary

| <i>Land Use - Unit</i> | <i>Usage Factor (2) Avg. Daily Use GPD/Unit</i> | <i>Existing Development</i> | <i>Existing Average Daily (GPD)</i> | <i>LMSAP Net New Development (2035) 6</i> | <i>LMSAP Net New Average Daily Use (GPD)</i> | <i>Total GPD</i> |
|--|---|---------------------------------|---|---|--|------------------|
| Residential Units (1) | 220 | 3,000 | 660,000 | 4,900 | 1,078,000 | 1,738,000 |
| Retail Square Feet (3) | 0.11 | 843,000 | 92,730 | 404,000 | 44,440 | 137,170 |
| Office Square Feet | 0.22 | 1,022,000 | 224,840 | 1,229,000 | 270,380 | 495,220 |
| Institutional Square Feet | 0.11 | 3,467,000 | 381,370 | 108,000 | 11,880 | 393,250 |
| Auto Services (Square Feet) | 0.11 | 64,500 | 7,095 | (29,019) | (3,192) | 3,903 |
| Hotel (Square Feet) | 0.25 | 369,800 | 92,450 | (51,597) | (12,899) | 79,551 |
| Light Industrial/Other Commercial (SF) | 0.11 | 192,000 | 21,120 | (29,540) | (3,249) | 17,871 |
| Structural Parking | 0.028 | | - | 300,000 | 8,400 | 8,400 |
| Total | | | 1,479,605 | | 1,393,759 | 2,873,364 |

1. Existing residential units is based on ACTC/ABAG projections for 2005, with projects completed between 2005 and 2012 added in.
2. Based on City of Oakland Average Flow Rates for Sewer Generation Calculation plus 10%, see chart below.
3. Non-residential square feet are estimated based building footprint square footage, multiplied by the number of stories in existing buildings.
4. Existing jobs are based on ACTC/ABAG projections for 2005; Plan jobs are based on one job for every 350 SF of retail space and one job for every 400 square feet o
5. ACTC 2005-2035 minus projects completed between 2005 and 2012 (which are included in the existing condition).
6. Net new development assumes reductions for any existing land uses.
7. Water use assumed for structured parking only.
8. Parking square feet calculated by multiplying the number of parking spaced by 250 sf/space.
9. Assumed hotel generation rate equal to motel.
10. Water demand is 10 percent greater than Sewer Generation rate.
11. For hotel assume that 1 room is equal to 650 sf.

Average Rates Used for Usage Calculation

(From City of Oakland Sanitary Sewer Design Guidelines, revised August 2008)

| | | |
|---------------------------------------|-------|----------|
| Automobile parking | 0.028 | gpd/sf |
| Commercial | 0.11 | gpd/sf |
| Motel | 165 | gpd/sf |
| Office Building | 0.22 | gpd/sf |
| Residential - 2 bedroom apt. or condo | 165 | gpd/unit |
| Retail Area | 0.11 | gpd/sf |