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**HAUSRATH
ECONOMICS
GROUP**

**HUGHSON FIRE PROTECTION DISTRICT
FACILITIES FINANCING PLAN
AND IMPACT FEE STUDY**

A Report to the
HUGHSON FIRE PROTECTION DISTRICT

Prepared by
HAUSRATH ECONOMICS GROUP

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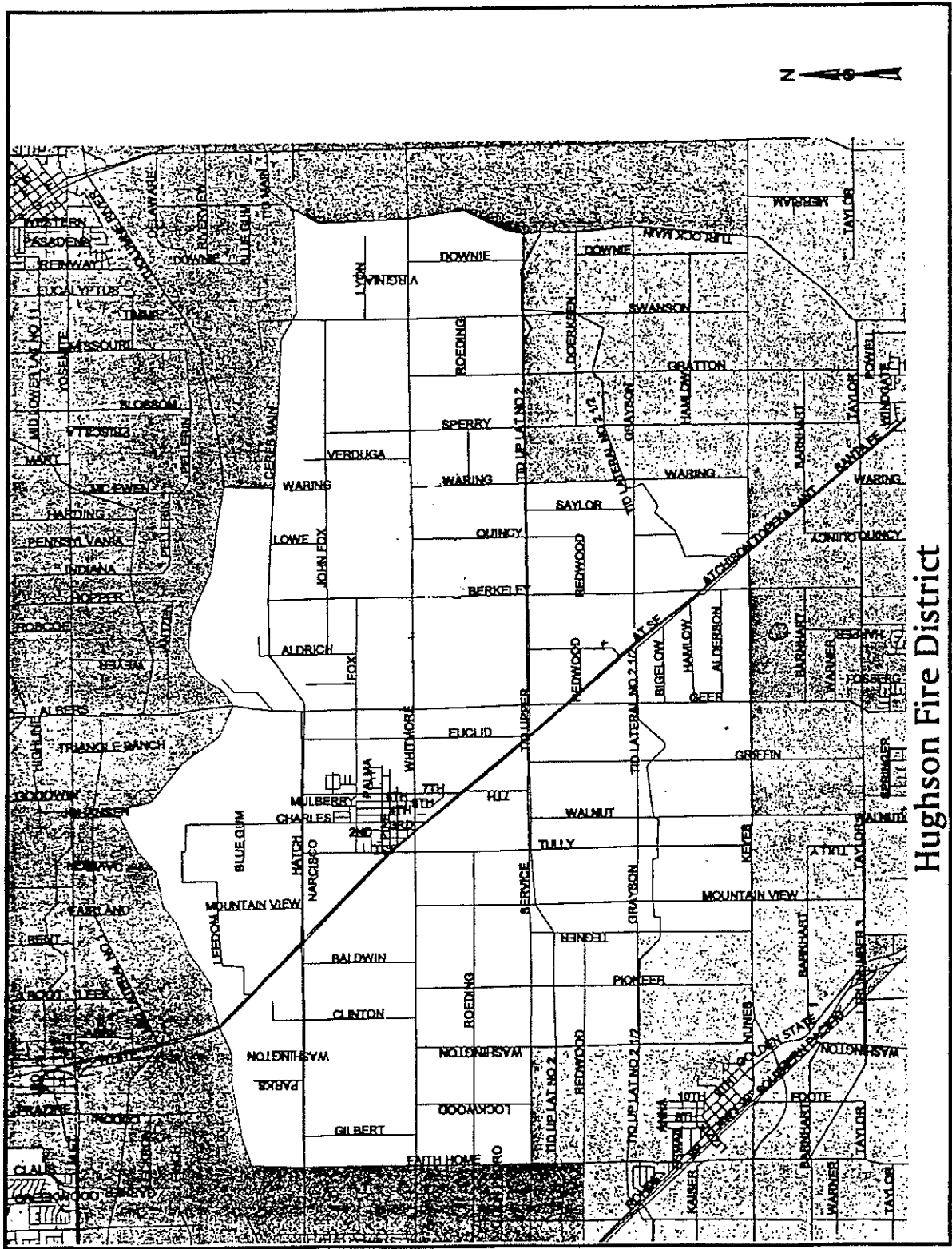
HUGHSON FIRE PROTECTION DISTRICT FIRE FACILITIES IMPACT FEE STUDY

INTRODUCTION

Over the past several years, Stanislaus County has experienced growing levels of residential and commercial development, placing increased demand on public infrastructure and services. To help finance the public facilities made necessary by growth, communities throughout the County have adopted public facility impact fees that require new development to contribute its fair share of the cost of infrastructure expansion. This study documents the relationship between anticipated growth and the need for additional fire and emergency facilities in the Hughson Fire Protection District. In addition, the study calculates a fire facility impact fee that allocates the cost of added facilities to new development.

The Hughson Fire Protection District (“HFPD”, or “District”) is located along the Burlington Northern Santa Fe railroad right-of-way, southeast of the City of Modesto and east of the City of Ceres, and north of the City of Turlock (see Figure 1). The District is bounded on the west by Ceres, on the north by the Tuolumne River and the Ceres Main irrigation canal, on the east by Turlock Irrigation District Main Canal (located between Downie and Hickman Roads), and on the south by Keyes Road.

The District provides fire protection and first-response emergency medical services (EMS) to a service area of approximately 35 square miles in and around the incorporated City of Hughson in Stanislaus County. Covering only 450 acres, or seven-tenths of a square mile, the City of Hughson accounts for just two percent of the land area served by the HFPD, but accounts for 50 percent of the District’s service population. The majority of the District’s existing suburban-style development is located within Hughson, which is immediately adjacent to the railroad right-of-way and Santa Fe Avenue in the north-central part of the HFPD. The remainder of the District consists primarily of semi-rural and rural productive farmland.



Population projections provided by Stanislaus County Council of Governments indicate that the population of the District will grow significantly in coming years. Increasing from a current population of 6,788, the resident population within the District's boundaries is estimated to reach 11,100 by 2025, or a 64 percent increase over 25 years. With so much potential growth within the Hughson Fire Protection District, establishing a reliable mechanism for financing additional required fire facilities is of paramount concern to the HFPD.

In the sections that follow, this report determines the amount and the cost of future facilities required to serve anticipated growth while maintaining current facility service levels, and calculates a fire facility impact fee that fairly allocates the costs of fire facilities to new development. In addition, the report makes findings pursuant to *California Government Code* Section 66001, *et seq.*, the statutory authority for local agencies to impose impact fees.¹ This fire facilities fee documentation is presented in the following sections:

- ◆ History of Fire Facilities Impact Fee Imposition in Stanislaus County
- ◆ Findings Required by *Government Code* 66001
- ◆ Existing and Projected Development
- ◆ Facilities Standards
- ◆ Future Facilities Needs
- ◆ Facilities Cost Allocation and Impact Fee Calculation
- ◆ Future Documentation Review and Updates

HISTORY OF FIRE FACILITIES IMPACT FEE IMPOSITION IN STANISLAUS COUNTY

Since 1988, the City of Modesto, several other incorporated cities, and Stanislaus County itself have implemented development impact fee programs. Additionally, in response to specific language contained in the 1987 *Stanislaus County General Plan* (Policy 22), six of 18 independent Fire Protection Districts implemented fire facility impact fee programs in 1991.² The *Stanislaus County General Plan* has since been updated retaining Policy 22. Hughson Fire Protection District was not among those six districts and does not currently have an adopted fire facilities fee.

¹ For the HFPD, Stanislaus County would officially impose the fee within the boundaries of the HFPD and transfer the fee revenues to the HFPD for the purposes stated in this report.

² The Fire Protection Districts imposing fire facilities fees in 1991 were: Oakdale Rural, Riverbank, Salida, Valley Home, Waterford-Hickman, and West Stanislaus. Several of these districts have since merged.

Per the *California Government Code*, and as clarified by a State of California Attorney General's opinion, fire protection districts do not have independent authority to implement development impact fees. This is not to be interpreted to mean that fees designed to insure the provision of fire protection facilities should not be levied. Rather, it means that the city or county with jurisdiction to impose fees needs to do so on behalf of the Fire Protection District. As with the other independent Fire Protection Districts implementing fire facility fees in Stanislaus County, the Stanislaus County Board of Supervisors must officially adopt and implement impact fees on behalf of the HFPD.

The Board of Supervisors of Stanislaus County adopted an enabling ordinance for fire facilities fees in 1991. (Stanislaus County Title 24 – Fire Protection Facilities Fees; enabling ordinance). Portions of this enabling ordinance were revised and updated in 1994. This study assumes that the fire facilities impact fee for the HFPD will be implemented in accordance with the current Title 24 enabling ordinance and that the HFPD will be treated procedurally in the same manner as the other Stanislaus County fire protection districts currently implementing fire facilities fees under the authorization of the Title 24 enabling ordinance.

FINDINGS REQUIRED BY *GOVERNMENT CODE* 66001

Government Code 66001 *et seq.* (AB 1600) governs impact fees (also referred to as “public facilities fees”) imposed by all public agencies. In particular, these statutes delineate an agency's documentation requirements for imposing fees, as well as requirements related to the administration of fee revenues. This section presents the five findings necessary to comply with *Government Code* 66001.

Purpose of the Fire Facilities Impact Fee

The purpose of the fire facilities impact fee is to provide funding for fire facilities required to serve new development.

Use of the Fire Facilities Impact Fee

Proceeds from the fire facilities impact fee would be used by the HFPD to provide fire facilities needed to serve new development, including:

- ♦ Expansion of the existing fire station;
- ♦ Purchase of additional equipment and apparatus;
- ♦ Necessary improvements to the existing station; and
- ♦ Expansion of administrative and other support equipment and facilities.

**Relationship Between the Use of Fire
Facilities Impact Fee and Type of New Development**

Fee revenue will be used to build new fire facilities, purchase new fire fighting apparatus, and make other facility improvements necessary to respond to increases in demand for fire services brought about by new development. Fire protection services are provided on a districtwide basis, supplemented by mutual-aid agreements with adjacent agencies. Hence, new development of any kind occurring anywhere within the District boundaries will contribute to the need for additional fire facilities and those facilities may be located throughout the District.

**Relationship Between the Need for
Fire Facilities and Type of New Development**

Fire facilities are needed to provide service at acceptable standards, such as maintaining adequate response times. New development generates the need for additional fire facilities by increasing the number of calls for service. Both residential and nonresidential development generate additional service calls due to the increased number of residents and workers, as well as an increased number of structures. The District will need additional fire facilities to maintain acceptable service standards while accommodating new development.

**Relationship Between the Amount of Fire
Facilities Fee Payment and Cost of Fire Facilities**

Fire facility fees are based on the amount of fire protection facilities and apparatus that will be required to serve the projected increase in service population (new residents and a portion of projected employees working within the District) and the associated costs. By using average occupant densities (square feet of residential development per resident and square feet of nonresidential development per employee), the total cost of facilities required to serve new development is fairly allocated to each new development project through the fee.

In addition, the fee is no more than is needed to maintain existing levels of service. The District's existing facilities (including its station and apparatus, *e.g.*, fire engines, other vehicles,

major equipment) were inventoried and replacement values assigned. The total estimated value of District facilities divided by the District's existing service population (residents and weighted proportion of employees) was used to determine an impact fee level corresponding to the District's existing level of facilities for its current service population.

EXISTING AND PROJECTED DEVELOPMENT

Developing estimates of existing and future residential and nonresidential development is a key first step in calculating the fire facilities fee and determining facilities needs. Projected residential development is based on official forecasts through the year 2025 prepared by the Stanislaus County Council of Governments (StanCOG) for its countywide traffic model, and adjusted by Hausrath Economics Group (HEG) to closely correspond to the District's boundaries. HEG further validated these projections by discussing them with Stanislaus County Planning Department staff. For nonresidential development, HEG also used employment projections from StanCOG's traffic model. The factors used to convert projections of housing units to population and square footage of residential development and to convert projections of jobs to amounts of nonresidential space were developed by HEG in consultation with the Stanislaus County Planning Department.

Table 1 shows existing and future housing units, residents, nonresidential development and employment in the HFPD.

TABLE 1
HUGHSON FIRE PROTECTION DISTRICT
EXISTING AND PROJECTED RESIDENT POPULATION,
HOUSING UNITS, EMPLOYMENT, AND RESIDENTIAL
AND NONRESIDENTIAL BUILDING SQUARE FOOTAGE

	2000	2025	Growth
Residential			
Housing Units	2,379	3,928	1,549
Residents per Unit	2.85	2.83	2.78
Residents	6,788	11,100	4,312
Residential Square Footage			2,478,470
Average Sq. Ft. per Unit			1,600
Average Sq. Ft. per Resident			575
Nonresidential			
Employees (Jobs)	3,039	4,906	1,867
Nonresidential Square Footage			1,493,821
Average Sq. Ft. per Employee			800
Sources: StanCOG; Stanislaus Co. Planning Dept.; Hughson Fire Protection			

FACILITIES STANDARDS

Approach

The determination of public facilities needed to serve existing and new development is typically based on standards that establish minimum levels of service. The accepted standard is used to determine facilities requirements to serve existing and new development. While the District may adopt any reasonable service standard, for the purposes of facility impact fees, new development is only responsible for its proportionate share of impact on the service standard and is not held accountable for higher standards than the current population is willing to provide for itself. In cases where *existing* facilities fall below the standard chosen as the basis for fees (often referred to as an “existing deficiency”), a fire protection district must use alternative (non-impact fee) funds to expand those facilities to the same standard and thereby remedy the existing deficiency.

For fire protection facilities, a commonly applied service standard is “response time,” or the time elapsed between a call for service and fire/emergency units’ arrival on scene. Fire stations are located in such a way that a district is able to provide the most effective coverage to its service population in the shortest possible time. As population and employment in a district grow over time, the district determines the amount of additional facilities required to maintain the adopted response time standard.

In addition to response time, fire protection service standards can be described in terms of fire facilities per square foot of building space within the service area, or fire facilities per service population. Service population is a measure of demand for District services based on the number of residents and employees in the service area. In the case of the HFPD, calls for service are generated increasingly by people needing medical assistance, rather than by structures requiring fire suppression. Hence, the demand for response service in the District is most strongly correlated with people -- either household residents, or employees working within the District. For this reason, this report uses service population as the basis for the service standard.

The service standard is calculated using *existing* facilities per service population. Therefore, the fire facilities impact fee documented in this report assumes that there is no existing deficiency for which existing development is considered responsible. Based on this fee, new development would contribute its proportionate fair share to maintaining a reasonable current service standard.

Service Population

Following the approach outlined above, service population, represented by people living in the District and people working in the District, is presented as a measure of demand for HFPD facilities. Table 2 shows an estimate of existing and anticipated service population associated with residential and nonresidential development in the HFPD. As the table indicates, the District’s service population is expected to increase by approximately 63 percent based on the land use projections described above.

To account for the difference in impacts between residents and employees, employees are assigned a relative weighting factor of 0.69. Relative District impacts of employees versus residents are often difficult to ascertain since fire protection districts normally do not track calls by residence or business location. Commercial and industrial spaces accommodating employees are typically utilized fewer hours per day than are residences, so it is a generally accepted practice in impact fee studies for places of employment to have a smaller assumed impact than

residences. The 0.69 weighting factor is derived from a Phoenix, Arizona survey where the relative impacts of employees and residents were explicitly studied. As far as we know, the Phoenix study is one of the few sources for this data.

TABLE 2 HUGHSON FIRE PROTECTION DISTRICT SERVICE POPULATION ESTIMATES AND PROJECTIONS			
Description	2000	2025	Growth
Residents			
Population	6,788	11,100	4,312
Weighting	100%	100%	100%
Adjusted Population	6,788	11,100	4,312
Employees			
Population	3,039	4,906	1,867
Weighting	69%	69%	69%
Adjusted Population	2,097	3,385	1,288
Total Service Population	8,885	14,485	5,600
Sources: StanCOG; Stanislaus Co. Planning Dept.; City of Phoenix; HEG.			

Existing Facilities and Standards

The facilities standard is measured by the value of existing capital facilities divided by the current service population. Standards for the fire station, vehicles, and other equipment are individually calculated then combined as an overall standard. This standard is the pro rata share of existing facilities and forms a limit to the facilities fee to be exacted from new development that adds to the service population. The existing fire station, vehicles, and other equipment owned and operated by the District are summarized in Appendix Table A-1.

The HFPD is currently served by one approximately 7,000-square-foot station centrally located within downtown Hughson at 2315 Charles Street, between Pine Street and Hughson Avenue. The assumed station replacement value is \$742,332, based on a replacement cost estimate performed by Magallon Construction, a local general contractor. This estimate represents a cost of \$106 per square foot, and is consistent with estimates for fire stations of similar size and construction from *Saylor Square Foot Building Costs* (an industry standard source for construction estimating) adjusted by applicable location factors. This estimate is considered conservative because, statewide, fire station costs typically range from \$140 to over \$200 per square foot.

The estimated land cost is \$6.50 per square foot, based on current market data provided by the Stanislaus County Tax Assessor's Office. Assuming these costs, the total replacement value of the District-owned station facilities is estimated at \$864,207. The existing facilities standard is represented by the equivalent per capita value of District property, including the station and all owned land: \$97.27 per capita. The *per capita* standard is calculated by dividing total replacement value by the existing service population (8,885 per Table 2).

Vehicles owned by the District represent another large existing facility investment. District-owned apparatus include six vehicles and a boat and trailer. The total replacement value of District vehicles and their equipment is \$1,087,300. Estimated apparatus value reflects the current replacement value. The existing vehicle facility standard (the equivalent *per capita* replacement value) is \$122.38 per capita.

Other equipment owned by the District includes firefighting/rescue equipment, turnouts and other clothing, communications equipment, station maintenance equipment and tools, and office equipment such as a computer. The total replacement value of this equipment is estimated at \$118,700. The equivalent facility standard is \$13.36 per capita.

Table 3 shows the overall existing facility standard for the HFPD, expressed as replacement value per capita. The table also shows the contribution of the three facility components. The overall existing standard, or total per capita replacement value of the station building and land, vehicles, and equipment, is \$233.01 per capita.

TABLE 3
HUGHSON FIRE PROTECTION DISTRICT
PER-CAPITA REPLACEMENT VALUE
OF EXISTING FACILITIES
(in 2000 Dollars)

	<u>Replacement Value</u>
Station and Land	\$97.27
Vehicles	122.38
Equipment	<u>13.36</u>
Total <i>Per Capita</i>	\$233.01
NOTE: Calculated by dividing total replacement value of existing facilities by the existing service population (8,885 per Table 2).	
Source: Hughson Fire Protection District; Hausrath Economics Group.	

FUTURE FACILITIES NEEDS

The Hughson Fire Protection District will be required to increase its facilities to accommodate the projected growth in service population while continuing to maintain existing service levels. Using the previously established service population standard of facilities replacement value per capita, Table 4 shows the estimated value of fire stations (building and land), vehicles, and equipment needed to serve anticipated new development.

Based on the existing ratio of station space per service population, the District would require approximately 4,412 additional square feet of station space to serve its estimated 2025 service population. The issue of whether the District will expand the existing station or build a new station is heavily influenced by the Burlington Northern Santa Fe railroad right-of-way, which borders downtown and is regularly used by freight trains and Amtrak passenger trains. This poses potential access and response time challenges as the existing station is located east of the right-of-way, and a large portion of new development is expected to the west. These access problems are further exacerbated by the recent construction of a feed mill along the BNSF main line in Hughson (expected to accommodate several mile-long trains per day), as well as by increasing traffic congestion on Santa Fe Avenue, which runs parallel to the railroad right-of-way and serves as a key connection between Modesto and Merced.

TABLE 4
HUGHSON FIRE PROTECTION DISTRICT
NEW FIRE FACILITIES REQUIRED
(in 2000 Dollars)

Description	Total Cost
Station Expansion and/or New Station	\$ 544,689
Vehicles	\$ 685,299
Equipment	\$ 74,814
Total	\$ 1,304,802
NOTE: Calculated by multiplying <i>per capita</i> replacement value factors (Table 3) by projected increase in service population (5,600, per Table 2).	
Sources: Hughson Fire Protection District; Hausrath Economics Group.	

In part because the HFPD is still a small district with a relatively small engine fleet, it is difficult to predict exactly what type of new vehicles and other equipment will be required. The facility standard is purposefully calculated in terms of the *value* per service population in recognition of the flexibility the District needs in acquiring new vehicles as the needs of new development dictate.

FACILITIES COST ALLOCATION AND IMPACT FEE CALCULATION

Residential and Nonresidential Development

This study allocates fire facilities costs to development on a service population basis and then translates that allocation into a per-square-foot fee, based on factors for the average amount (square feet) of residential development per resident and the average amount of nonresidential development per employee. Residents serve as a measure of residential development's fire service demand and are assigned a weight of one. Workers serve as a measure of nonresidential development's demand and are weighted by a factor of 0.69 relative to residents. As established above, this is a reasonable way to allocate costs for fire facilities because past analyses of service calls in the HFPD and other areas indicate that people are a primary determinant of the number of

fire and emergency medical service calls. (The calculation of service population was shown in Table 2.)

Fees for residential development are calculated using *the per capita* existing standard, weighted at one for residents, or \$233.01, as shown in Table 3. This study assumes that, on average, there will be 575 square feet of new residential construction per new resident, yielding an equivalent fee of \$0.41 per square foot of new residential development.

Fees for nonresidential development are calculated using the *per capita* existing standard, weighted for employees at 0.69, yielding an existing standard per employee of \$160.78. It is assumed that new nonresidential development (excluding agricultural development) will be constructed at an average density of approximately 800 square feet per employee.³ Assuming an average density of 800 square feet, the equivalent fee for nonresidential development equates to \$0.20 per square foot.

Discount for “Unoccupied Agricultural Structures”

No significant net increase in unoccupied agricultural structures is anticipated, as the level and type of farm activity is projected to remain stable. However, should there be construction of an unoccupied agricultural structure requiring a building permit (*e.g.*, a pole barn) resulting in a net increase in such space (*i.e.*, not just replacement of an existing building), it is the HFPD’s intention that a 50 percent discount be applied to the fire facilities fee for nonresidential development ($\$0.20 \times 0.50 = \0.10 per square foot).

This is consistent with the practice of the other Stanislaus County independent Fire Protection Districts currently imposing fire facilities fees. It also reflects the fact that over 50 percent of the District’s calls for services are now for medical responses and emergency rescue and that these types of structures (essentially used for storage of feed or animals and “unoccupied” by residents or employees on a full-time basis) by definition represent less of an impact upon Fire Protection District services.

³ The density factor of 800 square feet per employee was provided by Jim Duvall of the Stanislaus County Planning Department and is a relatively low density factor compared to new nonresidential development in most communities, but it is appropriate given the current employment densities in Hughson. This factor should be reviewed when the fee documentation is updated.

Exemption of Attached (Three-car and Smaller) Residential Garages

The Stanislaus County enabling ordinance for fire facilities fees (Title 24 – Fire Protection Facilities Fees), exempts the square footage of attached garages designed for three or less vehicles from the square footage used to calculate the imposition of fire facilities fees on residential structures. Per the ordinance, garage space greater than needed for three vehicles and/or detached garage space is not exempt from the fees.

Fee Schedule

The per-square-foot fire facilities fees for the HFPD are shown in Table 5.

TABLE 5 PROPOSED HUGHSON FIRE PROTECTION DISTRICT FIRE FACILITIES FEE SCHEDULE (2000 dollars)	
	<u>Fee per Square Foot</u>
Residential Development	\$0.41
Nonresidential Development	\$ 0.20
Unoccupied Agricultural Structures	\$ 0.10
Source: Hughson Fire Protection District; Hausrath Economics Group.	

FUTURE DOCUMENTATION REVIEW AND UPDATES

All cost estimates and fee revenues in this report are shown in constant year 2000 dollars. Facilities costs estimates should be systematically reviewed and updated to account for inflation and any other reasonable and necessary changes in cost estimates. More thorough documentation reviews and updates should be undertaken if there is evidence of significant changes in demographic assumptions or future facilities planning. In particular, if strict new state, federal, Cal-OSHA, and/or ISO regulations now under discussion are established, it would have the effect of raising required facility standards, and would thus require a recalculation of the fee. Barring

the need for such a major fee review, we recommend that a comprehensive update be conducted at minimum once every five to 10 years.

Annual Inflation Adjustment

Impact fee levels should be reviewed annually and adjusted, if necessary, to reflect inflation. We recommend the use of *Engineering News Record* construction cost indices as an industry standard for construction cost inflationary adjustments.

APPENDIX A

TABLE A-1
HUGHSON FIRE PROTECTION DISTRICT INVENTORY SHEET
REPLACEMENT VALUE OF FACILITIES AND EQUIPMENT (2000 Dollars)
(in 2000 Dollars)

Station Value

Land Area	150 l.f. wide	125 l.f. deep	18,750 s.f.
Value		\$6.50 /s.f.	\$121,875
Building Replacement Value			\$742,332
Total Station Value			\$864,207
Service Population (2000)			8,885
Value per Capita			\$ 97.27

Replacement Value Estimate - Vehicles

Description	Vehicle	Equipment	Total
Engine #21	\$50,913	\$230,000	\$280,913
Engine #23	\$58,383	\$116,766	\$175,149
Engine #24	\$27,012	\$230,000	\$257,012
Engine#52	\$20,641	\$110,000	\$130,641
Engine #63	\$6,020	\$195,000	\$201,020
HC-1	\$13,957	\$19,000	\$32,957
Zodiac Boat	\$9,000	\$628	\$9,628
Total Vehicle Replacement Value	\$185,927	\$901,394	\$1,087,321
Service Population (2000)			8,885
Value per Capita			\$ 122.38

Replacement Value Estimate - Equipment

Description	Equipment	Total
Club Room	\$13,795	\$13,795
North Barn	\$83,364	\$83,364
South Barn	\$16,612	\$16,612
Tower Walkway	\$4,887	\$4,887
Total Equipment Replacement Value	\$118,658	\$118,658
Service Population (2000)		8,885
Value per Capita		\$ 13.36

TOTAL Replacement Value	\$2,070,186
Service Population (2000)	8,885
Value per Capita	\$ 233.01

Source: Magallon Construction; Stanislaus County Assessors Office; HFPD; HEG.