

April 11, 2017

Ms. Judy Shanley
DAVID J. POWERS AND ASSOCIATES
1871 The Alameda, Suite 200
San Jose, California 95126

Re: HUD Explosive and Fire Hazards Review
Race Street/Grand Avenue Properties
San Jose, California

Dear Ms. Shanley:

This HUD Explosive and Fire Hazards Review was performed for David J. Powers and Associates, who is preparing a CEQA/NEPA (HUD) review for the proposed senior/family apartments project located at 237 through 253 Race Street, 216 through 260 Grand Avenue, and 1120 Park Avenue in San Jose, California.

Purpose

The purpose of this HUD Explosive and Fire Hazards Review was to identify facilities in the vicinity of the project site having significant observed or reported explosive and/or flammable materials storage, and to evaluate the "acceptable separation distance (ASD)" for the storage containers with respect to their proximity to the project site. This letter was prepared in accordance with the Agreement for Professional Services, dated March 23, 2017.

Scope of Work

This survey was conducted in general accordance with 24 CFR Part 51 Subpart C, Siting of HUD-Assisted Projects Near Hazardous Operations Handling Conventional Fuels or Chemicals of an Explosive or Flammable Nature. The scope of work performed included the following tasks.

- ◆ Performed a visual survey of the site vicinity in an attempt to identify readily observable names and addresses of businesses located within an approximately 2,000-foot radius of the project site appearing to have the potential to store significant quantities of explosive and/or flammable materials and/or wastes in stationary aboveground containers.

Running Moose Environmental Consulting, LLC
1355 Poe Lane, San Jose, CA 95130
Phone: 408-307-0129



- ◆ Reviewed the most recently available San Jose Fire Department (SJFD) hazardous materials inventory for each of the identified facilities, when available.
- ◆ Calculated ASDs for facilities with reported storage of significant quantities of explosive and/or flammable materials and/or wastes in aboveground containers.

Identified Potentially Significant Vicinity Facilities

On April 2, 2017, a visual survey of the businesses within approximately 2,000 feet of the project site was performed in an attempt to identify those appearing likely to store significant quantities of explosive and/or flammable materials. Current hazardous materials/waste inventories for 16 identified businesses were requested from the SJFD. Eight of the businesses had applicable SJFD documentation reporting storage of material quantities determined to warrant calculation of ASDs, in general accordance with the procedures outlined in 24 CFR Part 51 C. A summary of these businesses and the most conservative calculated ASD for each is presented in the following table. The complete ASD calculations are included as an attachment to this letter.

IDENTIFIED POTENTIALLY SIGNIFICANT FACILITIES AND ASSOCIATED ASDS

Facility Name	Facility Address	Approximate Distance from Site* (feet)	Calculated ASDs (feet)
Precision Tune	1353 W. San Carlos Street	205 feet from nearest proposed non-residentially occupied unit (mechanical room) 215 feet from nearest proposed residentially occupied units (apts. 1 and 66)	500 gallons lubricating oil or used motor oil = 208
Citi Cars	1295 W. San Carlos Street	315	55 gallons waste oil or waste coolant = 83
R&J Iron Works	1201 W. San Carlos Street	435	175 cubic feet/4.865 gallons propane = 38
O.C. McDonald	1150 W. San Carlos Street	690	300 gallons LPG = 168
P&T Auto Repair	1002 Park Avenue	700	55 gallons waste oil or waste coolant = 83
Williams Party Rentals	850-870 Park Avenue	1,390	55 gallons waste oil or waste coolant = 83
Michael & Co. Inc.	380 Lincoln Avenue	1,455	1,190 gallons motor oil = 298
Blossom Valley Collision	1176 Auzerais Avenue	1,475	55 gallons virgin or waste lacquer thinner or waste antifreeze = 83

* Distance from approximate storage location of explosive and/or flammable material to nearest property line of the project site measured using ruler feature of Google Earth.

Conclusions

Based on the calculated values, the ASD for the oil tanks (two at 500 gallons each) at the Precision Tune facility is satisfied for the proposed location (based on the provided "Project Data" packet including first floor site plan; attached to this letter) of the nearest residentially-occupied units on the site (215 feet). However, based on the distance of the tanks to the nearest proposed non-residentially occupied unit on the site (205 feet), the ASD is not satisfied. As labeled on the provided site plan, the unit planned nearest the Precision Tune facility appears to be utilized as a mechanical room. As this unit is not located at a distance satisfying the ASD, if it was to be residentially occupied it would not meet the HUD requirements.

Based on the calculated values, the ASDs for the other identified explosive and/or flammable materials are satisfied.

Limitations

The conclusions and recommendations made in this letter regarding potentially significant explosive and/or flammable materials users within the site vicinity were based on business names/addresses readily observable from accessible public right-of-ways and review of readily available documents containing data collected and/or reported by others at the time this study was performed. Other businesses using explosive and/or flammable materials may have been located within a 2,000-foot radius of the site, but were not observable or readily identifiable at the time this study was performed; data collected and/or reported by others may or may not have been accurate. The accuracy and completeness of hazardous materials information included in the available files provided by the SJFD are unknown. More accurate information on types, quantities, and storage conditions of explosive and/or flammable materials used at vicinity facilities could be obtained through performance of a site reconnaissance and/or interview with the business operators.

The data and conclusions presented in this letter are applicable only to the time this study was performed. Businesses and materials used within the site vicinity likely will change over time and this study should be updated as appropriate, to ensure that the most currently available data has been included. As with all HUD Explosive and Fire Hazard Reviews, the extent of information obtained was a function of client demands, time limitations, access limitations, and budgetary constraints.

This letter was prepared for the sole use of David J. Powers and Associates. No warranty, expressed or implied, has been made, except that the services have been performed in accordance with environmental principles generally accepted at this time and location.

Thank you for allowing Running Moose Environmental Consulting, LLC to assist you with this project. If you have any questions, please do not hesitate to call.

Sincerely,

Running Moose Environmental Consulting, LLC



Belinda P. Blackie, P.E.
P.E. Number C56448
Principal Environmental Engineer

References

Author unknown. *Project Data*. November 18, 2016.

California Environmental Reporting System (CERS). *Hazardous Materials and Wastes Inventory Matrix Report, Blossom Valley Collision, 1176 Auzerais Avenue, San Jose, CA 95126*. Submitted February 3, 2017.

CERS. *Hazardous Materials and Wastes Inventory Matrix Report, Citicars, 1295 W. San Carlos Street, San Jose, CA 95126*. Submitted September 30, 2015.

CERS. *Hazardous Materials and Wastes Inventory Matrix Report, Michael and Co. Inc., 380 Lincoln Avenue, San Jose, CA 95126*. Submitted December 15, 2016.

CERS. *Hazardous Materials and Wastes Inventory Matrix Report, O.C. McDonald Co., 1150 W. San Carlos Street, San Jose, CA 95126*. Submitted December 17, 2015.

CERS. *Hazardous Materials and Wastes Inventory Matrix Report, P&T Auto Repair, 1002 Park Avenue, San Jose, CA 95126*. Submitted November 17, 2016.

CERS. *Hazardous Materials and Wastes Inventory Matrix Report, Precision Tune Auto Care, 1353 W. San Carlos Street, San Jose, CA 95126*. Submitted February 6, 2017.

CERS. *Hazardous Materials and Wastes Inventory Matrix Report, Williams Party Rentals, 850 Park Avenue, San Jose, CA 95126*. Submitted January 24, 2017.

HUD. *24 CFR Part 51 Subpart C, Siting of HUD-Assisted Projects Near Hazardous Operations Handling Conventional Fuels or Chemicals of an Explosive or Flammable Nature, Acceptable Separation Distance (ASD) Electronic Assessment Tool*. 2017.
<https://www.hudexchange.info/environmental-review/asd-calculator/>

Unidocs. *Non-Waste Hazardous Materials Inventory Statement, R&J Ornamental Iron Works, 1201 W. San Carlos Street, San Jose, CA 95126*. October 21, 2010.

ASD Calculations

All ASDs were calculated using the program at:
<https://www.hudexchange.info/environmental-review/asd-calculator/>

Values listed in summary table within the letter were rounded up to the next whole foot.

Precision Tune – 1353 W. San Carlos Street

- 500 gallons lubricating oils/used motor oil (ambient pressure)
ASD for Thermal Radiation for People (fire) = 207.20 feet
ASD for Thermal Radiation for Buildings (fire) = 36.50 feet
- 200 gallons waste antifreeze (ambient pressure)
ASD for Thermal Radiation for People (fire) = 141.45 feet
ASD for Thermal Radiation for Buildings (fire) = 23.89 feet

Citi Cars – 1295 W. San Carlos Street

- 55 gallons waste oil or waste coolant (ambient pressure)
ASD for Thermal Radiation for People (fire) = 82.61 feet
ASD for Thermal Radiation for Buildings (fire) = 13.15 feet

R&J Iron Works – 1201 W. San Carlos Street

- 175 cubic feet propane (pressurized) = 4.865 gallons propane *
ASD for Blast Over Pressure (explosion) = 37.66 feet
ASD for Thermal Radiation for People (fire) = 30.08 feet
ASD for Thermal Radiation for Buildings (fire) = 4.29 feet
- 183 cubic feet acetylene (pressurized) = 2.54 gallons acetylene **
ASD for Blast Over Pressure (explosion) = 30.38 feet
ASD for Thermal Radiation for People (fire) = 22.94 feet
ASD for Thermal Radiation for Buildings (fire) = 3.17 feet

O.C. McDonald – 1150 W. San Carlos Street

- 300 gallons LPG (pressurized) ***
ASD for Blast Over Pressure (explosion) = 147.11 feet
ASD for Thermal Radiation for People (fire) = 167.48 feet
ASD for Thermal Radiation for Buildings (fire) = 28.82 feet
- 55 gallons motor oil or waste diesel (ambient pressure)
ASD for Thermal Radiation for People (fire) = 82.61 feet
ASD for Thermal Radiation for Buildings (fire) = 13.15 feet
- 300 cubic feet acetylene (pressurized) = 4.16 gallons acetylene **
ASD for Blast Over Pressure (explosion) = 35.76 feet
ASD for Thermal Radiation for People (fire) = 28.18 feet
ASD for Thermal Radiation for Buildings (fire) = 3.99 feet

P&T Auto Repair – 1002 Park Avenue

- 55 gallons waste coolant or waste oil (ambient pressure)
ASD for Thermal Radiation for People (fire) = 82.61 feet
ASD for Thermal Radiation for Buildings (fire) = 13.15 feet

Williams Party Rentals – 850-870 Park Avenue

- 55 gallons waste coolant or waste oil (ambient pressure)
ASD for Thermal Radiation for People (fire) = 82.61 feet
ASD for Thermal Radiation for Buildings (fire) = 13.15 feet
- 25 gallons propane (pressurized) ***
ASD for Blast Over Pressure (explosion) = 64.69 feet
ASD for Thermal Radiation for People (fire) = 59.48 feet
ASD for Thermal Radiation for Buildings (fire) = 9.14 feet
- 136 cubic feet acetylene (pressurized) = 1.88 gallons acetylene **
ASD for Blast Over Pressure (explosion) = 27.50 feet
ASD for Thermal Radiation for People (fire) = 20.24 feet
ASD for Thermal Radiation for Buildings (fire) = 2.76 feet

Michael and Co. Inc. – 380 Lincoln Avenue

- 1,190 gallons motor oil (ambient pressure)
ASD for Thermal Radiation for People (fire) = 297.35 feet
ASD for Thermal Radiation for Buildings (fire) = 54.49 feet
- 110 gallons antifreeze coolant (ambient pressure)
ASD for Thermal Radiation for People (fire) = 110.27 feet
ASD for Thermal Radiation for Buildings (fire) = 18.12 feet
- 35 gallons flammable solvent, lacquer thinner or paint (ambient pressure)
ASD for Thermal Radiation for People (fire) = 68.43 feet
ASD for Thermal Radiation for Buildings (fire) = 10.67 feet
- 130 cubic feet acetylene (pressurized) = 1.80 gallons acetylene **
ASD for Blast Over Pressure (explosion) = 27.11 feet
ASD for Thermal Radiation for People (fire) = 19.88 feet
ASD for Thermal Radiation for Buildings (fire) = 2.71 feet

Blossom Valley Collision – 1176 Auzerais Street

- 55 gallons virgin and waste lacquer thinner or waste antifreeze (ambient pressure)
ASD for Thermal Radiation for People (fire) = 82.61 feet
ASD for Thermal Radiation for Buildings (fire) = 13.15 feet
- 30 gallons waste paint (ambient pressure)
ASD for Thermal Radiation for People (fire) = 64.18 feet
ASD for Thermal Radiation for Buildings (fire) = 9.94 feet
- 200 cubic feet acetylene (pressurized) = 2.78 gallons acetylene **
ASD for Blast Over Pressure (explosion) = 31.30 feet
ASD for Thermal Radiation for People (fire) = 23.82 feet
ASD for Thermal Radiation for Buildings (fire) = 3.31 feet

- * Propane: 0.028 gallons/cubic foot
(www.edcgov.us/government/ag/propane_conversion_chart.aspx);
hazardous materials inventory indicated storage at ambient pressure, but based on propane properties storage presumed to be pressurized.

- ** Acetylene: 0.014 gallons/cubic foot
(http://www.fire.lacounty.gov/wp-content/uploads/2014/03/Gas_Conversion_Chart.pdf);
hazardous materials inventory indicated storage at ambient pressure, but based on acetylene properties storage presumed to be pressurized.

- *** Hazardous materials inventory indicated storage at ambient pressure, but based on gas properties storage presumed to be pressurized.

Project Data – Site Plan