## **Plumbing Review**

Group	Title	Year, Code	Section(s)	Comment Text
Fixtures	EYEWASH STATION INADEQUATE	2018 IPC	411	Please provide details for emergency shower/eyewash stations. Where tempered water is
				required/specified, provide ASSE 1071 temperature actuated mixing valve to be used and specify the
				temperature of water to be delivered to the emergency eyewash/shower station. (IPC 411)
Fixtures	TEMPERED WATER REQUIRED	2018 IPC	419.5	Please add details/requirements as applicable for tempered water limiting device(s). (IPC 419.5)
Fixtures	NONCOMPLIANT FITTINGS	2018 IPC	412.3, 412.4, 412.5, 412.7,	Please provide details as applicable to show compliance (temperature/pressure-balanced, etc.). (IPC
			412.10, 423.3	412.3, 412.4, 412.5, 412.7, 412.10, and/or 423.3)
General	PROVIDE FLOOR/CEILING DESIGN NUMBER	2018 IPC	307.3	Please provide a design number (UL or other) for the required fire-resistance rated floor/ceiling and/or roof/ceiling assembly. (IPC 307.3)
General	NONCOMPLIANT HANGER SUPPORTS	2018 IPC	308.5	Please revise hanger spacing/size requirements in accordance with city adopted amendment. Pipe shall be supported in accordance with Table 308.5. Hanger rods shall be sized in accordance with IPC Table 308.5.1. (IPC 308.5)
Indirect Waste	INSUFFICIENT INDIRECT WASTE PIPING FOR FOOD HANDLING	2018 IPC	802.1.1, 802.3	Please revise indirect waste piping detail for food handling equipment/fixtures. Details shall also include/show the requirements as outlined in IPC 802.3. When local health department requirements are more restrictive than IPC requirements, the more restrictive requirements shall apply. (IPC 802.1.1, 802.3)
Indirect Waste	INSUFFICIENT INDIRECT WASTE PIPING FOR SINKS	2018 IPC	802.1.7, 802.3	Please revise indirect waste piping detail for sinks used for washing, rinsing, or sanitizing. Details shall also include/show the requirements as outlined in IPC 802.3. When local health department requirements are more restrictive than IPC requirements, the more restrictive requirements shall apply. (IPC 802.1.7, 802.3)
Medical Gas	MEDICAL GAS STORAGE ASSEMBLY REQUIRED	2018 IPC, 2018 NFPA 99	1202	Please provide complete and specific construction details (i.e., IBC prescriptive requirements, UL listing number, or other approved fire-resistive assembly) for the medical gas storage areas which is required to be enclosed by a 1-hour rated assembly. Such rooms shall not communicate directly with anesthetizing locations. (IPC 1202, NFPA 99)
Medical Gas	MEDICAL GAS SYSTEM DETAILS REQUIRED	2018 IPC, 2018 NFPA 99	1202	Please provide complete construction details including size and types of materials to be used, manufactures information for all equipment to be used (i.e., vacuum pumps, compressors, etc.), piping identification requirements, testing pressure/vacuum requirements, piping termination details, manifold system diagrams/details, etc. for medical gas, medical air, and vacuum piping as applicable specifically to this project. (IPC 1202, NFPA 99)
Medical Gas	MEDICAL GAS TESTING AGENCY REQUIRED	2019 IPC, 2018 NFPA 99	1203	Please provide the name and contact information of the third-party agency that will be testing and providing a final certification report for the medical gas piping system. Information provided shall include all inspections that will be performed and included in the final report. (IPC 1203, NFPA 99)
Sanitary	BACK WATER VALVE REQUIRED	2018 IPC	714.1	Drawings appear to indicate plumbing fixtures are installed on a floor with a finished elevation below that of the next upstream manhole in the public sewer. This requires the use of a back water valve. Revise detail to show compliance with IPC Section 714.1.
Interceptors	GREASE/SAND/OIL INTERCEPTORS	2018 IPC	1003	Interceptors and separators are regulated by the serving sewer district and shall be approved by their review staff prior to plan approval.

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Water Heaters	VACUUM RELIEF REQUIRED	2018 IPC	504.2	Drawings indicate water heater(s) is(are) bottom fed. Bottom fed water heaters and bottom fed tanks connected to water heaters shall have a vacuum relief valve installed. Add to details a vacuum relief device conforming to ANSI Z21.22. (IPC Section 504.2)
Water Heaters	AIR GAP REQUIRED	2018 IPC	504.6	Drawings indicate that the discharge piping serving a pressure/temperature relief valve is discharging in a different room than the appliance is located. Add to detail the required air gap within the same room as the appliance. (IPC Section 504.6)
Water Supply	THERMAL EXPANSION CONTROL DEVICE REQUIRED	2018 IPC	607.3	Please provide details to show compliance with IPC Section 607.3. Thermal expansion control devices shall be installed per manufacturer's installation instructions. Shut off valve(s) shall not be located between the water heater storage tank and the expansion relief device.
Water Supply	PROHIBITED WASTE VALVE SPECIFIED	2018 IPC	608.8	Drawings indicate the use of a stop and waste valve below grade for the lawn sprinkler system. This is prohibited by code for potable water. Please revise details to show compliance with IPC Section 608.8.
Water Supply	INCORRECT COPPER MATERIAL	2018 IPC	605.3, 605.4	Per city-adopted amendment, Type M copper is not permitted for potable water piping systems.  Please revise to show Type L or K.
Water Supply	INSUFFICIENT TEMPERED WATER LIMITED DEVICE	2018 IPC	607.1, 607.1.1, 607.1.2	Please add details/requirements as applicable for tempered water limiting device(s) in accordance with IPC Sections 607.1, 607.1.1, and 607.1.2.
Water Supply	BACKFLOW PREVENTER REQUIRED	2018 IPC	Table 608.1	Please provide a backflow preventer per IPC Table 608.1 and indicate on plans or schedule. Note: backflow preventers also require review and approval by the serving water district. (IPC Table 608.1)