



**KIVA #:** \_\_\_\_\_ **Project Name:** \_\_\_\_\_

**Reviewed By:** \_\_\_\_\_ **Phone:** \_\_\_\_\_ **Date:** \_\_\_\_\_

**Engineer:** \_\_\_\_\_ **Phone:** \_\_\_\_\_

The purpose of this checklist is to offer comments on submittal requirements and plan design for Water – Vertical Realignment plans for public water lines that are 12” and smaller. The source of the Water – Vertical Realignment design is the city of Phoenix Designs Standards Manual for Water and Wastewater Systems.

This checklist serves to minimize redline comments on the check prints and to maintain consistency among plan reviewers on plans for water line realignments. Plan approval, issuing permits, and certain grading clearances depend on compliance with the comments made on the check prints and this checklist. The engineer of record shall satisfy themselves of the completeness and accuracy of the design.

A completed checklist must be attached to the Water – Vertical Realignment plans when submitted for first review. The following Certification Statement must be signed by the Engineer of record certifying that all applicable requirements on this checklist have been met.

Plan review correction cycles and/or approvals are valid for 180 days. Additional review fees (see Fee Schedule – Phoenix City Code, Chapter 9, Appendix A.2) shall be charged for extensions/reinstatements to update expired plan reviews.

**CERTIFICATION**

**I CERTIFY THAT THE REFERENCED PLANS COMPLY WITH ALL APPLICABLE CITY ORDINANCES AND STANDARDS, INCLUDING FEDERAL, STATE AND COUNTY REQUIREMENTS AND REGULATIONS. IN ADDITION, I CERTIFY THAT THIS CHECKLIST HAS BEEN COMPLETED ENSURING ALL ITEMS LISTED ARE PROPERLY ADDRESSED. I UNDERSTAND THAT IF I FAIL TO ADDRESS ALL APPLICABLE ITEMS IN THIS CHECKLIST, THE PLANS MAY BE IMMEDIATELY RETURNED TO ME WITHOUT ANY FORMAL REVIEW BEING PERFORMED.**

**Engineer’s Name:** \_\_\_\_\_

**Engineer’s Signature:** \_\_\_\_\_ **Date:** \_\_\_\_\_

Please complete and return this checklist and the check prints with each submittal. Discussion of redline comments on plans or this checklist should be directed to the plan reviewer listed above.

Engineer of record (**ENG**) must fill out all boxes in the first column as either  (Addressed) or  (Not Applicable).

Civil plan reviewer (**RVW**) shall check the second column as  (Required) when requirements have not been properly addressed.

**REQUIRED SUBMITTALS**

**ENG RVW**

- Plan sheets shall be 8 ½" X 11" or 24" X 36"; submit four (4) sets of Water Main – Vertical Realignment plans, a sealed cost estimate, and a completed and signed Water Main – Vertical Realignment Checklist.

**Note:** If submitting through the Electronic Plan Review system, multiple copies of submittal documents are not required.

**GENERAL REQUIREMENTS ON PLAN:**

- Provide the information, as required, on city of Phoenix Standard Detail DCE-D01. The detail can be located at the following website: <http://phoenix.gov/waterservices/design/engdetails/index.html>.
- Symbols shall be per M.A.G. Specifications and Details supplemented by Water Services Department Details.
- Orientation of each plan sheet shall be shown by a north arrow and scale of drawing. (North arrow is to be up or to the right.)
- Each sheet shall be identified by sheet number and project name.
- The plan shall have the Civil Engineer's Arizona registration seal with the original signature and date prior to any plan submittal.
- All plan sheets shall be sufficiently clear to allow legible prints to be reproduced from microfilm. The size of lettering and symbols shall be 1/8 inch minimum. Shading or zip tape is not permitted. Refer to Water Services Department Design Standards Manual (P-68) for information required on record drawings ("As-Builts").
- Ductile Iron Pipe (minimum Class 50 pipe) is required to be used to dip a water line in the city of Phoenix right-of-way.
- Return four (4) corrected bond copies for subsequent reviews, with the redline check prints and this checklist, to Payments and Submittals, 2<sup>nd</sup> Floor of City Hall.

**PLAN NOTES:**

**(All notes to be included on the plan sheet)**

- All construction shall be performed in compliance with all applicable uniform standard details and specifications for public works construction of Maricopa Association of Governments (M.A.G.) and the Phoenix Supplemental Standard Details and Specifications (newest edition and as modified hereon).
- Approved Restraint Joints shall be per city of Phoenix Supplements Subsection 750.3 and M.A.G. Standard Detail 303-1 and 303-2.
- Restrain all pipe joints, separation and clearance per city of Phoenix Standard Detail P1370.
- All Ductile Iron Pipe water mains will be polyethylene wrapped per C.O.P. Supplement to M.A.G. Specifications Section 750.2 and M.A.G. Specifications Section 610.6.2 and 610.6.3.
- All elevations shown here are relative to each other.
- Traffic regulations shall be per city of Phoenix "Traffic Barricade Policy".
- Compaction shall comply with M.A.G. Section 601, 95% minimum in a public street.
- A pavement cut surcharge will be assessed to this project for trenching in newly paved or newly overlaid pavement.

**ENG RVW**

- Pavement replacement thickness and type are to be per M.A.G. and C.O.P. Supplement to M.A.G. Section 336 and C.O.P. Detail P1200 - Type B. Curb and gutter replacement shall be a minimum of one (1) full section, per M.A.G. Standard Detail 220. Sidewalk replacement shall be a minimum of one (1) full panel per C.O.P. Detail P1230. At the discretion of the city of Phoenix Planning & Development offsite inspector, tunneling under existing curb and gutter, in city of Phoenix R.O.W., will be allowed. Tunneling under existing sidewalk will not be allowed in the city of Phoenix R.O.W.
- Plan approval is valid for 180 days. Prior to plan approval expiration, all associated permits shall be purchased or the plans shall be resubmitted for extension of plan approval. The expiration, extension, and reinstatement of Civil Engineering plans and permits shall follow the same guidelines as those indicated in the Phoenix Building Construction Code Administrative Provisions Section 105.3 for Building permits.
- Per the city of Phoenix Ordinance G-4396, this plan is for official use only and may not be shared with others except as required to fulfill the obligations of your contract with the city of Phoenix. (Place this note on each sheet of the plans.)

**PLAN SHEET REQUIREMENTS:**

- Provide project information at the top of the plan including: KIVA #, Quarter Section #, Project Name, and location.
- Provide the Blue Stake notification decal.
- Provide the project station and invert of the conflicting utility pipe, including the invert.
- Provide offsets & inverts of the dip section fittings from the utility pipe in conflict.
- Indicate the locations of the beginning and the end of construction and all pipe fittings. Their locations must be shown by stationing and dimensioning from appropriate monument lines, or in their absence, appropriate easement references. No dimensioning from points of curvature or tangency is acceptable. The drawings must clearly indicate the specific points of reference.  
**NOTE:** In all cases where the pipe is constructed within, parallel, or in close proximity with the right-of-way, all stationing and dimensioning must be from the nearest appropriate monument line and monument line intersection.
- Elevation datum and bench marks (city datum required). Please dial (602) 495-2050, ext. 265 Voice or (602) 534-5500 TTY, to obtain city datum for existing benchmark closest to the project site. Equations cannot be used.
- Provide the nearest platted intersection location to the project. This will be the beginning station 0+00 location.
- Show the existing valves to be shut down during the course of construction with valve numbers as shown on the city of Phoenix Quarter Section Map.
- Provide utility type, size, and material, invert elevation, dimension from monument line, and stationing for the utility that is in conflict with the existing water main.
- Installation of pipe to be called out as follows:  
"Installation of \_\_\_\_" D.I.P. Class \_\_\_\_\_. Polyethylene wrap, per C.O.P. Supplement to M.A.G. Specifications Section 750.2 and M.A.G. Specifications Section 610.6.2 and 610.6.3."
- Show and label the existing water main size and material.

**ENG RVW**

- Provide As-Built Certification on the plans:

**AS-BUILT CERTIFICATION:**

I hereby certify that the "Record Drawing" measurements as shown hereon were made under my supervision or as noted and are correct to the best of my knowledge and belief.

\_\_\_\_\_  
Registered Engineer

\_\_\_\_\_  
Date

\_\_\_\_\_  
Registration Number

**ADVISORY:**

- A pavement cut surcharge may be assessed on this project for trenching in new asphalt pavement or overlay. This fee may be assessed in addition to the regular permit fees and is over and above any special backfill, compaction, and pavement replacement stipulations that may be imposed as a condition of permitting. Surcharge affects streets newly paved and newly overlaid.

**PLANS FOR REVISION**

- All original plan approvals, signatures, and seals are to remain on the revised plans.
- All plans revised after the original approval shall be resubmitted for review and approval. The nature of the revisions must be called out on the cover sheet and on the sheet(s) which have been revised. The revision number itself shall consist of a numeral within a triangle next to each revision.  $\Delta$  Changes on each plan sheet shall be highlighted with "clouding".
- All revised sheets, including the cover sheet are to be re-sealed, signed and dated.

**EXTENSIONS**

- All plans submitted for extension require a new signature block and are to be re-signed by the submitting designer. Plan extensions are to be highlighted with "clouding" as specified in the plan revision process above. The plan sealant shall note that this change is a plan extension. A new approval signature block is required to be added to the coversheet for approval of the extension. All plan extensions must have prior approval by completing the Plan Review Extension Application. The Plan Review Extension Application can be found at the following site: <http://phoenix.gov/pdd/development/sitecivil/civil/index.html>. Provide a copy of the approved application with the plan submittal.
- Plan approvals for extension are valid for a period of 180 days from the date of plan approval.