

AMITY TOWNSHIP

Berks County, Pennsylvania

**STANDARD SPECIFICATIONS AND
DETAILS FOR**

**SANITARY SEWER EXTENSIONS
AND REPAIRS**

December 2005

5951.43

Prepared By:

ARRO Consulting, Inc.
400 Washington Street, Suite 602
Reading, Pennsylvania 19601
(610) 374-5285

TABLE OF CONTENTS

	<u>Page</u>
GENERAL	
SECTION 1. INTRODUCTION	1
SECTION 2. DEFINITIONS	1
SECTION 3. CONDITIONS OF SERVICE	3
SECTION 4. RESPONSIBILITIES OF THE DEVELOPER	4
SECTION 5. APPLICATION PROCESS	4
A. Sewer Service Requests	4
B. Preliminary Plan Submission	5
C. Final Approval	5
D. Financial Security for Construction of Sewer Facilities	7
SECTION 6. CONSTRUCTION OF SEWER IMPROVEMENTS	7
A. Preconstruction Meeting	7
B. Inspection During Construction	7
C. Final Inspection	8
SECTION 7. DEDICATION OF SEWER IMPROVEMENTS	8
A. Deed of Dedication and Record Plans	8
B. Operation and Maintenance Financial Security	9
C. Release of Operation and Maintenance Financial Security	9
SECTION 8. PLAN REQUIREMENTS	9
SECTION 9. HIGHWAY AND STREET OPENING PERMITS AND RESTORATION OF SURFACE	11
SECTION 10. EMERGENCY MAINTENANCE DURING CONSTRUCTION	11
SECTION 11. SINKHOLES	12
SECTION 12. BORING, JACKING, OR TUNNELING	13
SECTION 13. STREAM CROSSINGS	15
SECTION 14. PUMP STATIONS	15
SECTION 15. COMMUNITY TREATMENT/DISPOSAL SYSTEMS	18
SECTION 16. LOW PRESSURE SYSTEMS	18
SECTION 17. PRIVATELY-OWNED INDIVIDUAL GRINDER PUMPS AND/OR NON-CLOG SEWAGE PUMPS	18
SECTION 18. STANDARD OF QUALITY	29

Page

SPECIFICATIONS

Division 1 – General Requirements

Section 01300 – Submittals	01300-1
Section 01400 – Quality Control	01400-1
Section 01500 – Construction Facilities and Temporary Controls	01500-1

	<u>Page</u>
Section 01560 – Soil Erosion and Sedimentation Control	01560-1
Section 01570 – Traffic Regulation	01570-1
Section 01600 – Materials and Equipment	01600-1

Division 2 – Site Work

Section 02010 – Subsurface Exploration	02010-1
Section 02100 – Clearing and Grubbing	02100-1
Section 02151 – Shoring	02151-1
Section 02221 – Trenching, Backfilling, and Compacting	02221-1
Section 02260 – Finish Grading	02260-1
Section 02500 – Paving and Surfacing	02500-1
Section 02601 – Manholes	02601-1
Section 02650 – Manhole Rehabilitation	02650-1
Section 02731 – Gravity Wastewater Sewer	02731-1
Section 02732 – Force Mains	02732-1
Section 02733 – Low-Pressure Wastewater Sewer	02733-1
Section 02855 – Pavement Markings	02855-1

Division 3 – Concrete

Section 03100 – Concrete Formwork	03100-1
Section 03200 – Concrete Reinforcement	03200-1
Section 03300 – Cast-in-Place Concrete	03300-1
Section 03600 – Grout	03600-1

APPENDIX A

Application for Sewer System Extension

STANDARD DETAILS

- 1 - Precast Manhole Detail 8" through 24" Sewers
- 2 - Precast Manhole Detail with Drop Connection
- 3 - Precast Manhole Detail with Force Main Discharge
- 4 - Manhole with Precast Base and Positive Seal Gasket
- 5 - Standard Manhole Frame and Cover With Grade Rings Detail
- 6 - Standard Manhole Frame and Cover Without Grade Rings Detail
- 7 - Watertight Manhole Frame and Cover With Grade Rings Detail
- 8 - Watertight Manhole Frame and Cover Without Grade Rings Detail
- 9 - Precast Channel Details
- 10 - Inside Splash/Inside Drop (8"-10") Manhole Details
- 11 - Gravity Sewer Connection to Existing Manhole Detail

STANDARD DETAILS (Continued)

- 12 - Inside Splash/Drop Connection (8"-10") to Existing Manhole (by Special Exception)
- 13 - New Manhole on Existing Main Detail
- 14A - Precast Doghouse Manhole Detail (by Special Exception Only)
- 14B - Precast Doghouse Bottom Detail (by Special Exception Only)
- 15 - Air Valve Vault Detail (Force Main Only)
- 16 - Trench Restoration Lawn/Field Areas
- 17 - Trench Restoration Existing Paved Areas
- 18 - Trench Restoration New Roadways
- 19 - Manhole Frame/Cover Protection Detail Prior to Final Paving
- 20 - Concrete Encasement Detail
- 21 - Gravity Sewer Crossing Utilities Detail
- 22 - Force Main Crossing Utility Detail (Using Deflecting Joints)
- 23 - Casing Cradle Detail – Gravity Sewer Installation via Boring/Jacking
- 24 - Casing Cradle Detail (Open Cut or Force Main)
- 25 - Restrained Pipe Length Schedule (Ductile Iron Pipe)
- 26 - Horizontal and Vertical Up Restraint Thrust Blocking Detail – Elbows (DIP)
- 27 - Horizontal Restraint Thrust Blocking Detail – Tees (DIP)
- 28 - Vertical Down Restraint Thrust Blocking Detail – Elbows (DIP)
- 29 - Concrete Anchor Detail
- 30 - Existing Lateral Extension
- 31 - Lateral Detail
- 32 - Inspection/Test Tee
- 33 - Cover for Inspection/Test Tee in Traffic
- 34 - 6" Lateral Into New Manhole (by Special Exception Only)
- 35 - Inside Splash/Drop – 6" Lateral into Existing Manhole (by Special Exception Only)
- 36 - 6" Lateral into Existing Manhole (by Special Exception Only)
- 37 - Manhole Abandonment Detail
- 38 - Curb and Sidewalk Details
- 39 - Existing Vents and Cleanouts in Paved Areas Detail
- 40 - New Cleanout in Paved Areas Detail (by Special Exception Only)
- 41 - Pipeline Crossing Detail (Storm Sewer)
- 42 - Simplex Grinder Pump Detail
- 43 - Pressure Lateral Detail – Discharge to Gravity Main
- 44 - Pressure Lateral Detail – Discharge to Pressure Main