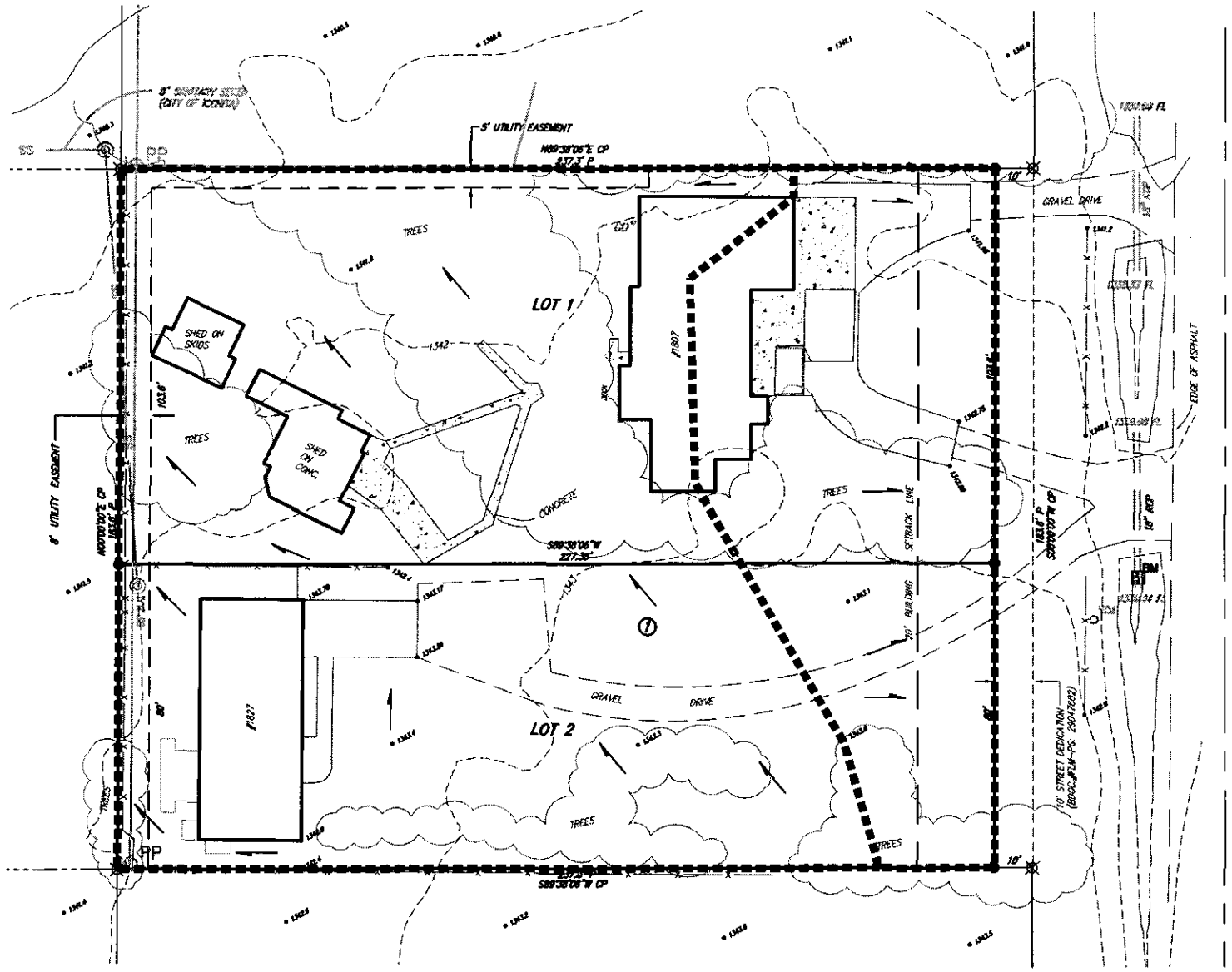
JOHNSON ESTATES
DRAINAGE PLAN

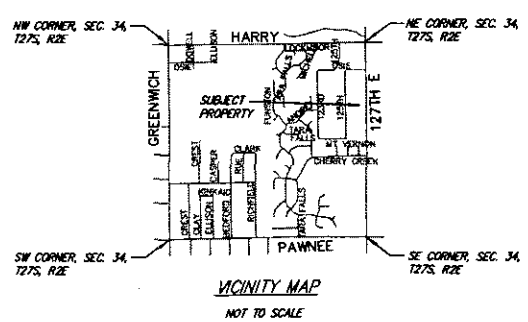
GENERAL NOTES

EXISTING RESIDENTIAL HOMES WILL REMAIN AS EXISTING. NO NEW STRUCTURES OR IMPERVIOUS AREA PROPOSED.

NATURAL DRAINAGE PATTERNS AND PATHS WILL BE MAINTAINED. THERE IS NO REGRADING PROPOSED WITH THIS PROJECT. THERE ARE NO WETLANDS OR FLOODPLAINS IMPACTED BY THIS SITE. THERE IS UNDER 0.1 ACRE OF THE ADJOINING PROPERTY TO THE SOUTH THAT RUNS ONTO THE SUBJECT PROPERTY. EXISTING DEVELOPMENT AROUND PROPERTY IS ALL RESIDENTIAL.

DUE TO THE SMALL SIZE OF THE SITE, NO DETENTION, WATER QUALITY PROTECTION OR CHANNEL VOLUME PROTECTION IS REQUIRED FOR THIS PROJECT. DETENTION AND WATER QUALITY TREATMENT WILL BE REQUIRED IF DEVELOPMENT THRESHOLDS IN CHAPTER 16.32 OF THE CITY CODE ARE EXCEEDED.





VICINITY MAP
NOT TO SCALE

BENCHMARK:

CHISELED SQUARE ON THE SOUTH END OF RCP, AT THE SOUTHERLY ENTRANCE TO 1807 S. 127TH ST. E.

ELEVATION = 1341.28 (NAVD88)

Drainage Calculations

EXISTING IMPERVIOUS = 7,430 FT²
PROPOSED IMPERVIOUS = 7,430 FT²
TOTAL SITE AREA = 41,743 FT² (0.96 ACRES)
EXISTING IMPERVIOUS % = 18%
PROPOSED IMPERVIOUS % = 18%

Irwin Group D Soils

HYDROLOGIC GROUP D
Tc = 15 MINUTES
I₂ = 3.83 in/hr
I₅ = 4.56 in/hr
I₁₀ = 5.22 in/hr
I₂₅ = 6.06 in/hr
I₁₀₀ = 7.37 in/hr
C₂ = 0.41
C₅ = 0.45
C₁₀ = 0.54
C₂₅ = 0.63
C₁₀₀ = 0.71

West Basin

Storm	C	I	A	Q
2	0.41	3.83	0.70	1.1
5	0.45	4.56	0.70	1.4
10	0.54	5.22	0.70	2.0
25	0.63	6.06	0.70	2.7
100	0.71	7.37	0.70	3.7

East Basin

Storm	C	I	A	Q
2	0.41	3.83	0.26	0.4
5	0.45	4.56	0.26	0.5
10	0.54	5.22	0.26	0.7
25	0.63	6.06	0.26	1.0
100	0.71	7.37	0.26	1.4

Existing and Proposed Runoff are the same.

KENNETH W. LEE 15373 12-7-12 PROFESSIONAL ENGINEER

JOHNSON ESTATES
DRAINAGE PLAN
WICHITA, KANSAS

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DESIGN: KWL
DRAWN: KWL
REVIEW:
UTILITY:
DATE: Dec. 7, 2012
RB JOB #: 4008
SHEET 1 OF 1
DRAWING FILE: X
PROJECT NUMBER: -