









LEGEND	
	PROPERTY LINE
	EXISTING DRAINAGE AREA
	EXISTING DRAINAGE AREA LABEL
	NOAA ATLAS 14 FLOOD BOUNDARY
	SUBJECT PROPERTY

NOTES:  
NOAA FLOOD INUNDATION BOUNDARY WAS DELINEATED VIA STUDY PERFORMED BY GOODE FAITH ENGINEERING, OCTOBER 18, 2023



CIVIL ENGINEERING AND PLANNING  
972-832-1682  
TBPE FIRM REGISTRATION NO. F-22664

**SUNSET RIDGE RANCH**  
 EXISTING DRAINAGE PLAN

DATE  
12-20-2023  
PROJECT NO.  
23-020.0  
DESIGNED BY  
CHECKED BY

NO.	REVISIONS	DATE



**TR-55 Tc Worksheet**

	A	B	C
Manning's n-value	0.24	0.011	0.011
Flow length (ft, 300 max.)	100		
Two-yr 24-hr rain (in)	4.06		
Land slope (%)	0.5		
Sheet flow time	22.06	0.00	0.00

  

	A	B	C
X-sectional area (sqft)	11.7		
Wetted perimeter (ft)	18.82		
Channel slope (%)	1.8		
Manning's n-value	0.050	0.015	0.015
Flow length (ft)	5406		
Channel flow time	30.99	0.00	0.00

  

	A	B	C
Flow length (ft)	808		
Watercourse slope (%)	3.21		
Surface description	Unpaved	Paved	Paved
Shallow conc. flow time	4.66	0.00	0.00

  

Sheet flow time = 22.06 min
Shallow conc. flow time = 4.66 min
Channel flow time = 30.99 min
Time of conc., Tc = 57.7 min

Compute Print... Help Exit

DRAINAGE CALCULATIONS SUNSET RIDGE							
DESIGN POINT	DRAINAGE AREA	ACRES	Tc (MIN)	Lag Time	Curve Number	Impervious Cover (%)	Q (100YR) (CFS)
A	EX-1	375	57.7	34.6	84.0	20.0%	1707