

The NGS Data Sheet

See file [ds data.txt](#) for more information about the datasheet.

PROGRAM = datasheet95, VERSION = 8.00

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1      National Geodetic Survey,   Retrieval Date = DECEMBER 5, 2012
GG0744 *****
GG0744 DESIGNATION - CHETOPA
GG0744 PID - GG0744
GG0744 STATE/COUNTY- KS/LABETTE
GG0744 COUNTRY - US
GG0744 USGS QUAD - WELCH NORTH (1971)
GG0744
GG0744 *CURRENT SURVEY CONTROL
GG0744
GG0744* NAD 83(1997) POSITION- 36 59 59.55570(N) 095 05 07.99141(W) ADJUSTED
GG0744* NAD 83(1997) ELLIP HT- 222.838 (meters) (10/02/98) ADJUSTED
GG0744* NAVD 88 ORTHO HEIGHT - 252.43 (+/-2cm) 828.2 (feet) VERTCON
GG0744
GG0744 GEOID HEIGHT - -29.68 (meters) GEOID12A
GG0744 NAD 83(1997) X - -452,095.948 (meters) COMP
GG0744 NAD 83(1997) Y - -5,080,102.206 (meters) COMP
GG0744 NAD 83(1997) Z - 3,817,516.329 (meters) COMP
GG0744 LAPLACE CORR - -0.27 (seconds) DEFLEC12A
GG0744 HORZ ORDER - SECOND
GG0744 VERT ORDER - THIRD ? (See Below)
GG0744 ELLP ORDER - FOURTH CLASS I
GG0744
GG0744.The horizontal coordinates were established by classical geodetic methods
GG0744.and adjusted by the National Geodetic Survey in October 1998.
GG0744.
GG0744.The NAVD 88 height was computed by applying the VERTCON shift value to
GG0744.the NGVD 29 height (displayed under SUPERSEDED SURVEY CONTROL.)
GG0744
GG0744.The vertical order pertains to the NGVD 29 superseded value.
GG0744
GG0744.The X, Y, and Z were computed from the position and the ellipsoidal ht.
GG0744
GG0744.The Laplace correction was computed from DEFLEC12A derived deflections.
GG0744
GG0744.The ellipsoidal height was determined by GPS observations
GG0744.and is referenced to NAD 83.
GG0744
GG0744. The following values were computed from the NAD 83(1997) position.
GG0744
GG0744;
GG0744;          North          East          Units Scale Factor Converg.
GG0744;SPC KS S - 442,546.943 703,877.367 MT 1.00006314 +2 05 53.8
GG0744;SPC KS S - 1,451,922.76 2,309,304.33 sFT 1.00006314 +2 05 53.8
GG0744;UTM 15 - 4,096,891.796 314,423.980 MT 1.00002427 -1 15 19.7
GG0744
GG0744! - Elev Factor x Scale Factor = Combined Factor
GG0744!SPC KS S - 0.99996503 x 1.00006314 = 1.00002817
GG0744!UTM 15 - 0.99996503 x 1.00002427 = 0.99998930
GG0744
GG0744: Primary Azimuth Mark Grid Az
GG0744:SPC KS S - CHETOPA AZ MK 173 09 00.9

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GG0744:UTM 15 - CHETOPA AZ MK 176 30 14.4

GG0744

PID	Reference Object	Distance	Geod. Az
			ddmmss.s
CI1435	CHETOPA RM 1	22.598 METERS	13607
CI1434	CHETOPA AZ MK		1751454.7
CI1436	CHETOPA RM 2	36.134 METERS	24435
HE0748	CHETOPA MUNICIPAL TANK	APPROX. 4.5 KM	3474618.0
CI1438	CHETOPA RM 4	20.274 METERS	35243
CI1437	CHETOPA RM 3	20.275 METERS	35257

GG0744

GG0744 SUPERSEDED SURVEY CONTROL

GG0744

GG0744	NAD 83(1993)-	36 59	59.55993(N)	095 05	07.99141(W)	AD()	2
GG0744	NAD 83(1986)-	36 59	59.57394(N)	095 05	07.98129(W)	AD()	2
GG0744	NAD 27	- 36 59	59.31974(N)	095 05	07.12678(W)	AD()	2
GG0744	NGVD 29 (07/19/86)	252.32	(m)	827.8	(f)	LEVELING	3

GG0744

GG0744.Superseded values are not recommended for survey control.

GG0744

GG0744.NGS no longer adjusts projects to the NAD 27 or NGVD 29 datums.

GG0744.[See file dsdata.txt](#) to determine how the superseded data were derived.

GG0744

GG0744_U.S. NATIONAL GRID SPATIAL ADDRESS: 15SUA1442396891(NAD 83)

GG0744

GG0744_MARKER: DS = TRIANGULATION STATION DISK

GG0744_SETTING: 7 = SET IN TOP OF CONCRETE MONUMENT

GG0744_SP_SET: CONCRETE POST

GG0744_STAMPING: CHETOPA 1958

GG0744_MARK LOGO: CGS

GG0744_MAGNETIC: N = NO MAGNETIC MATERIAL

GG0744_STABILITY: C = MAY HOLD, BUT OF TYPE COMMONLY SUBJECT TO

GG0744+STABILITY: SURFACE MOTION

GG0744_SATELLITE: THE SITE LOCATION WAS REPORTED AS SUITABLE FOR

GG0744+SATELLITE: SATELLITE OBSERVATIONS - August 07, 2009

GG0744

GG0744 HISTORY - Date Condition Report By

GG0744 HISTORY - 1958 MONUMENTED CGS

GG0744 HISTORY - 1958 GOOD CGS

GG0744 HISTORY - 1964 GOOD CGS

GG0744 HISTORY - 1967 GOOD CGS

GG0744 HISTORY - 1967 GOOD CGS

GG0744 HISTORY - 19890301 GOOD NGS

GG0744 HISTORY - 19890720 GOOD NGS

GG0744 HISTORY - 20090807 GOOD KSDT

GG0744

GG0744 STATION DESCRIPTION

GG0744

GG0744'DESCRIBED BY COAST AND GEODETIC SURVEY 1958 (RLE)

GG0744'THE STATION IS LOCATED ABOUT 8 MILES NORTH OF WELCH AND 2-1/2

GG0744'MILES SOUTH OF CHETOPA NEAR THE OKLAHOMA-KANSAS STATE LINE.

GG0744'IT IS 115 FEET NORTH OF THE CENTER OF A GRAVELED ROAD, 76

GG0744'FEET EAST OF THE CENTER OF U.S. HIGHWAY 59 AND 45 FEET NORTHWEST

GG0744'OF A POWER LINE BRACE POLE. THE MARK PROJECTS 4 INCHES

GG0744'ABOVE THE SURFACE OF THE GROUND AND IS STAMPED CHETOPA 1958.

GG0744'

GG0744'REFERENCE MARK NO. 1 IS 62 FEET NORTH OF THE CENTER OF A

GG0744'GRAVELED ROAD (STATE LINE ROAD), 58 FEET NORTHWEST OF A

GG0744'TELEPHONE POLE AND 31 FEET NORTHEAST OF A POWER LINE BRACE

GG0744'POLE. THE MARK PROJECTS 4 INCHES ABOVE THE SURFACE OF THE
GG0744'GROUND AND IS STAMPED CHETOPA NO 1 1958.
GG0744'
GG0744'REFERENCE MARK NO. 2 IS 64 FEET NORTH OF THE CENTER OF A
GG0744'GRAVELED ROAD, 32 FEET WEST OF THE CENTER OF U.S. HIGHWAY 59
GG0744'AND 1 FOOT NORTH OF A POWER LINE POLE. THE MARK PROJECTS
GG0744'4 INCHES ABOVE THE SURFACE OF THE GROUND AND IS STAMPED
GG0744'CHETOPA NO 2 1958.
GG0744'
GG0744'THE AZIMUTH MARK IS 72 FEET NORTH OF A FENCE CORNER, 48 FEET
GG0744'EAST OF THE CENTER OF U.S. HIGHWAY 59, 2 FEET NORTH OF A WHITE
GG0744'WITNESS POST AND 1 FOOT WEST OF AN EAST-WEST FENCE LINE.
GG0744'THE MARK PROJECTS 4 INCHES ABOVE THE SURFACE OF THE GROUND
GG0744'AND IS STAMPED CHETOPA 1958.
GG0744'
GG0744'TO REACH THE STATION FROM THE POST OFFICE IN CHETOPA GO EAST
GG0744'ON U.S. HIGHWAYS 166 AND 59 FOR 0.1 MILE TO THE JUNCTION
GG0744'OF THE HIGHWAYS. TURN RIGHT, SOUTH, ON U.S. HIGHWAY 59 AND GO
GG0744'2.5 MILES TO THE STATION ON THE LEFT AS DESCRIBED.
GG0744'
GG0744'TO REACH THE AZIMUTH MARK FROM THE STATION CONTINUE STRAIGHT
GG0744'AHEAD ON U.S. HIGHWAY 59 AND GO 0.35 MILE TO THE AZIMUTH MARK
GG0744'ON THE LEFT AS DESCRIBED.
GG0744'
GG0744'HEIGHT OF LIGHT ABOVE STATION MARK 22.6 METERS.
GG0744'
GG0744' STATION RECOVERY (1958)
GG0744'
GG0744'RECOVERY NOTE BY COAST AND GEODETIC SURVEY 1958
GG0744'RECOVERED IN GOOD CONDITION.
GG0744'
GG0744' STATION RECOVERY (1964)
GG0744'
GG0744'RECOVERY NOTE BY COAST AND GEODETIC SURVEY 1964 (JKW)
GG0744'THE STATION MARK, R.M. 1, R.M. 2 AND THE AZIMUTH MARK WERE
GG0744'RECOVERED IN GOOD CONDITION. THE DISTANCES TO THE R.M.S WERE
GG0744'VERIFIED. THE ORIGINAL DESCRIPTION IS ADEQUATE.
GG0744'
GG0744' STATION RECOVERY (1967)
GG0744'
GG0744'RECOVERY NOTE BY COAST AND GEODETIC SURVEY 1967 (LFS)
GG0744'STATION RECOVERED AS DESCRIBED AND ALL MARKS FOUND IN GOOD
GG0744'CONDITION. R.M. NO. 2 WAS REPORTED TO BE IN THE WAY OF HIGHWAY
GG0744'CONSTRUCTION SO THIS MARK WAS RESET. A NEW REFERENCE MARK
GG0744'WAS ESTABLISHED AND IT WAS STAMPED NO 3.
GG0744'
GG0744'TO REACH THE STATION FROM CHETOPA, FROM THE JUNCTION OF
GG0744'U.S. HIGHWAYS 59 AND 166, GO SOUTH ON U.S. 59 FOR 2.5 MILES
GG0744'TO CROSSROADS AND STATION ON THE LEFT.
GG0744'
GG0744'THE STATION IS IN THE NORTHEAST ANGLE OF CROSSROADS, 115 FEET
GG0744'NORTH OF THE STATE LINE ROAD, 76 FEET EAST OF THE CENTERLINE
GG0744'OF U.S. 59, 45 FEET NORTHWEST OF A POWERLINE BRACE POLE
GG0744'AND 1 FOOT WEST OF A METAL WITNESS POST. THE MARK PROJECTS
GG0744'3 INCHES AND THE DISK IS STAMPED CHETOPA 1958.
GG0744'
GG0744'R.M. NO. 1 IS 62 FEET NORTH OF THE CENTERLINE OF THE STATE
GG0744'LINE ROAD, 58 FEET NORTHWEST OF A TELEPHONE POLE AND 31 FEET
GG0744'NORTHEAST OF A POWERLINE BRACE POLE. THE MARK PROJECTS 4
GG0744'INCHES AND THE DISK IS STAMPED CHETOPA NO 1 1958.
GG0744'

GG0744'R.M. NO. 3 IS ABOUT 180 FEET NORTH OF THE CENTERLINE OF THE
GG0744'STATE LINE ROAD AND ABOUT 69 FEET EAST OF THE CENTERLINE OF
GG0744'U.S. 59. THE MARK PROJECTS 4 INCHES AND THE DISK IS STAMPED
GG0744'CHETOPA 1958 1967 NO 3.

GG0744'

GG0744'THE AZIMUTH MARK IS 72 FEET NORTH OF A FENCE CORNER, 48 FEET
GG0744'EAST OF THE CENTERLINE OF THE HIGHWAY, 1 FOOT WEST OF RIGHT OF
GG0744'WAY FENCE AND 1 FOOT NORTHWEST OF A METAL WITNESS POST.
GG0744'THE MARK PROJECTS 2 INCHES AND THE DISK IS STAMPED CHETOPA 1958.
GG0744'

GG0744'AIRLINE DISTANCE AND DIRECTION FROM NEAREST TOWN- 2.5 MILES
GG0744'SOUTH CHETOPA.

GG0744

GG0744

STATION RECOVERY (1967)

GG0744

GG0744'RECOVERY NOTE BY COAST AND GEODETIC SURVEY 1967 (LFS)
GG0744'STATION MARK, REFERENCE MARK NO. 1, AND THE AZIMUTH MARK
GG0744'WERE RECOVERED AS DESCRIBED AND FOUND IN GOOD CONDITION.
GG0744'REFERENCE MARK NO. 3 WAS FOUND DISPLACED AND THE MARK WAS
GG0744'RESET. THE 1967 DESCRIPTION WAS FOUND ADEQUATE FOR RECOVERY.
GG0744'

GG0744'FOLLOWING IS A DESCRIPTION FOR REFERENCE MARK NO. 4.

GG0744'

GG0744'REFERENCE MARK NO. 4, A STANDARD DISK STAMPED CHETOPA 1958 NO.
GG0744'4 1967, IS SET IN THE TOP OF A SQUARE CONCRETE POST WHICH
GG0744'PROJECTS 5 INCHES. IT IS 180 FEET NORTH OF THE CENTER OF STATE
GG0744'LINE ROAD, 69 FEET EAST OF THE CENTER OF U.S. HIGHWAY 69,
GG0744'AND 37 FEET NORTH OF AN UNDERGROUND TELEPHONE CABLE BOX ON A
GG0744'CRESOTE POST.

GG0744'

GG0744'AIRLINE DISTANCE AND DIRECTION FROM NEAREST TOWN- 2.5 MILES
GG0744'SOUTH OF CHETOPA.

GG0744

GG0744

STATION RECOVERY (1989)

GG0744

GG0744'RECOVERY NOTE BY NATIONAL GEODETIC SURVEY 1989
GG0744'THE STATION WAS RECOVERED IN GOOD CONDITION, A NEW DESCRIPTION
GG0744'FOLLOWS.

GG0744'THE STATION IS LOCATED ABOUT 14.0 KM (8.70 MI) NORTH OF WELSH, OK, AND
GG0744'4.1 KM (2.55 MI) SOUTH OF CHETOPA. OWNERSHIP--STATE HIGHWAY
GG0744'DEPARTMENT.

GG0744'TO REACH THE STATION FROM THE JUNCTION OF U.S. HIGHWAYS 59 AND 166 IN
GG0744'CHETOPA, GO SOUTH ON HIGHWAY 59 FOR 4.1 KM (2.55 MI) TO THE STATION ON
GG0744'THE LEFT, JUST BEFORE REACHING THE OKLAHOMA STATE LINE.

GG0744'THE STATION IS A STANDARD CGS DISK SET IN THE TOP OF A 25 CM SQUARE
GG0744'CONCRETE POST THAT PROJECTS 5 CM ABOVE THE GROUND. LOCATED 32.4 M
GG0744'(106.3 FT) NORTH OF THE CENTER OF STATELINE ROAD, 23.4 M (76.8 FT)
GG0744'EAST OF THE CENTERLINE OF THE HIGHWAY, 13.7 M (44.9 FT) NORTHWEST OF A
GG0744'UTILITY POLE, 9.0 M (29.5 FT) SOUTHEAST OF AN UNDERGROUND CABLE
GG0744'WARNING POST, AND 0.3 M (1.0 FT) WEST OF A METAL WITNESS POST.
GG0744'DESCRIBED BY E.J. HANSMANN, TYPED BY GAM.

GG0744

GG0744

STATION RECOVERY (1989)

GG0744

GG0744'RECOVERY NOTE BY NATIONAL GEODETIC SURVEY 1989
GG0744'RECOVERED IN GOOD CONDITION.

GG0744

GG0744

STATION RECOVERY (2009)

GG0744

GG0744'RECOVERY NOTE BY KANSAS DEPARTMENT OF TRANSPORTATION 2009 (KH)
GG0744'RECOVERED IN GOOD CONDITION.

*** retrieval complete.
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