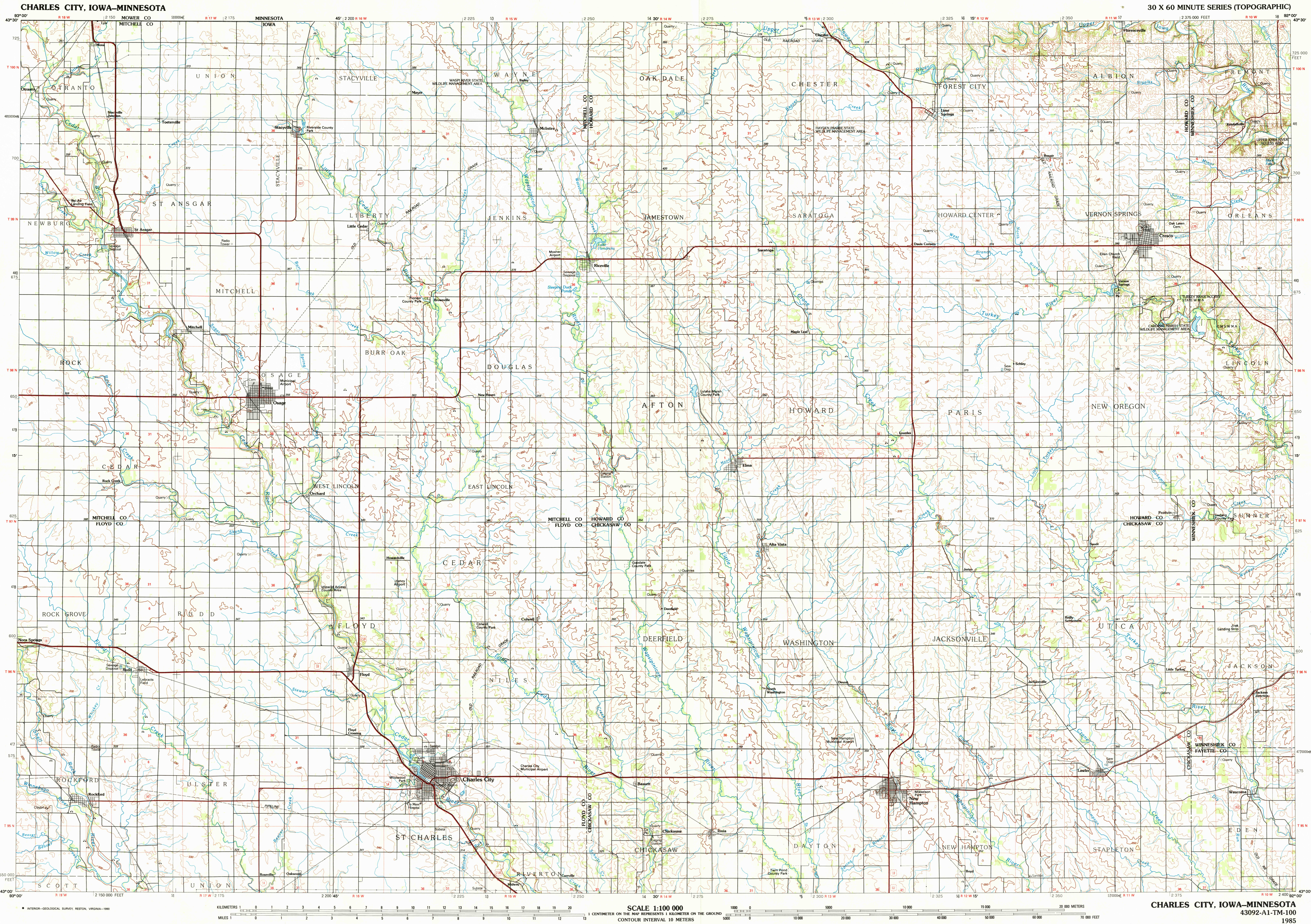




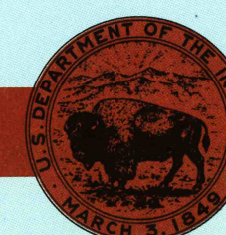
Charles City IOWA-MINNESOTA

1:100 000-scale metric
topographic map



30 X 60 MINUTE QUADRANGLE
SHOWING

- Contours and elevations in meters
- Highways, roads and other manmade structures
- Water features
- Woodland areas
- Geographic names



GEOLOGICAL SURVEY

1985

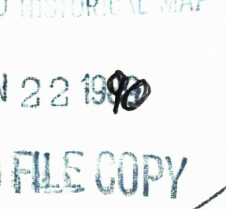
Produced by the United States Geological Survey
Compiled from USGS 1:24 000-scale topographic maps dated 1971-1981. Planimetry revised from aerial photographs taken 1982-83 and other source data. Revised information not field checked. Map edited 1985
Projection and 10 000-meter grid, zone 15,
Universal Transverse Mercator
25 000-foot grid ticks based on Iowa coordinate system, north zone
1927 North American Datum
To place on the predicted North American Datum 1983, move the projection lines 6 meters north and 16 meters east
There may be private inholdings within the boundaries of the National or State reservations shown on this map

CONTOUR INTERVAL 10 METERS
NATIONAL GEODETIC VERTICAL DATUM OF 1929
ELEVATIONS SHOWN TO THE NEAREST METER

THIS MAP COMPLIES WITH NATIONAL MAP ACCURACY STANDARDS

CONVERSION TABLE		DECLINATION DIAGRAM	ADJOINING MAPS			
Meters	Feet		1	2	3	
1	3.2808		1	2	3	
2	6.5617		4	5	6	
3	9.8425		7	8	9	
4	13.1234		10	11	12	
5	16.4042		13	14	15	
6	19.6850		16	17	18	
7	22.9658		19	20	21	
8	26.2467		22	23	24	
9	29.5275		25	26	27	
10	32.8084		28	29	30	
To convert meters to feet multiply by 3.2808		UTM grid convergence (G) and 1983 magnetic declination (M) at center of map. Diagram is approximate.		1 Albert Lea 2 Austin 3 La Crosse 4 Mason City 5 Decatur 6 Iowa Falls 7 Waverly 8 Osceola		
To convert feet to meters multiply by 0.3048						

FOR SALE BY U.S. GEOLOGICAL SURVEY
DENVER, COLORADO 80225, OR RESTON, VIRGINIA 22092



Topographic Map Symbols

Primary highway, hard surface	
Secondary highway, hard surface	
Light duty road, principal street, hard or improved surface	
Other road or street; trail	
Road marker: Interstate, U.S., State	
Railroad: standard gage; narrow gage	
Bridge: overpass; underpass	
Tunnel: road; railroad	
Built up area; locality; elevation	
Airport; landing field; landing strip	
National boundary	
State boundary	
County boundary	
National or State reservation boundary	
Land grant boundary	
U.S. public lands survey: range, township, section	
Range, township; section line: protracted	
Power transmission line; pipeline	
Dam; dam with lock	
Cemetery; building	
Windmill; water well; spring	
Mine shaft; adit or cave; mine, quarry; gravel pit	
Campground; picnic area; U.S. location monument	
Ruin; cliff dwelling	
Distorted surface: strip mine, lava, sand	
Contours: index; intermediate; supplementary	
Bathymetric contours: index; intermediate	
Stream, lake: perennial; intermittent	
Rapids, large and small; falls, large and small	
Area to be submerged; marsh, swamp	
Land subject to controlled inundation; woodland	
Scrub; mangrove	
Orchard; vineyard	

A pamphlet describing topographic maps is available on request

SCALE 1:100 000

1 CENTIMETER ON THIS MAP REPRESENTS 1 KILOMETER ON THE GROUND

CONTOUR INTERVAL 10 METERS

CHARLES CITY, IOWA-MINNESOTA

43092-A1-TM-100

1985