



PO Box 219, 14579 Government Road, Larder Lake, Ontario, P0K 1L0, Canada
Phone (705) 643-2345 Fax (705) 643-2191 www.explorationservices.ca

OUTCROP EXPLORATIONS LIMITED

Magnetometer and VLF EM Surveys Over the

GILLIES PROPERTY Gillies Limit Township, Ontario



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1. SURVEY DETAILS

1.1 PROJECT NAME

This project is known as the **Gillies Property**.

1.2 CLIENT

Outcrop Explorations Limited.

RR#1.
857921 Martin Drive
Coleman Township
Cobalt, Ontario
POJ 1C0

1.3 LOCATION

The Gillies Property is located approximately 5km south of Cobalt, Ontario. The survey area is located in Gillies Limit within the Larder Lake Mining Division.

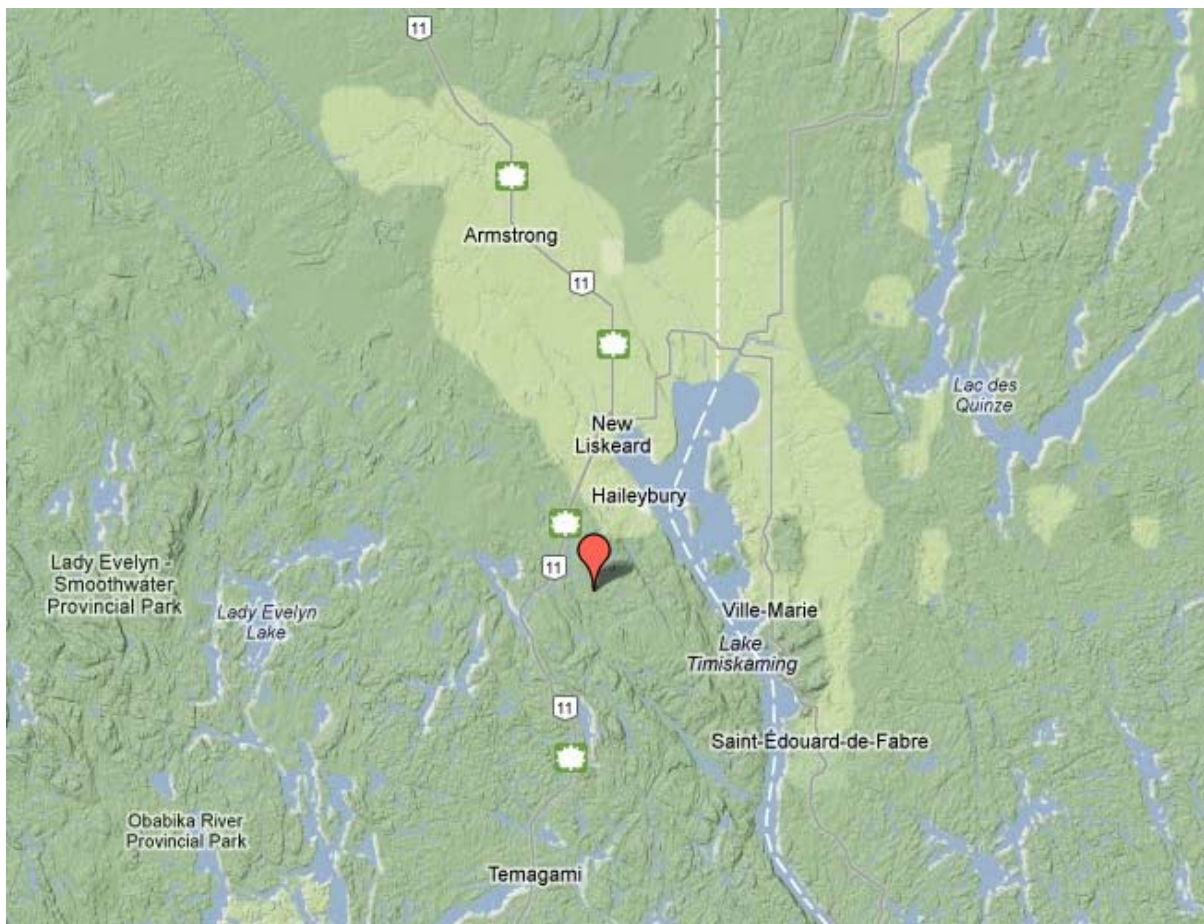


Figure 1: Location of Gillies Property

2. SURVEY WORK UNDERTAKEN

2.1 SURVEY LOG

Date	Description	Line	Min Extent	Max Extent	Total Survey (m)
May 17, 2012	Mobilize from Larder to Cobalt. Locate survey area and begin survey.	2000N	1150E	1875E	725
		1200N	1550E	2125E	575
		1100N	1450E	2125E	425
		1000N	1475E	2125E	400
		900N	1525E	2125E	350
		1800E	1200N	2000N	800
May 18, 2012	Continue survey. Extremely hot and dry conditions. Demobilize for break.	1500N	1050E	1675E	625
		1400N	1050E	1675E	625
		1300N	1050E	1600E	550
		1200N	1050E	1650E	600
May 22, 2012	Return to Cobalt and continue survey. Dangerously hot and dry conditions continue.	1900N	1150E	1950E	800
		1800N	1525E	1950E	425
		1700N	1525E	1950E	425
		1600N	1150E	2125E	975
		1500N	1675E	2125E	450
May 23, 2012	Continue survey. Smoke from forest fires in air.	2000N	200E	1150E	950
		1800N	1150E	1525E	375
		1700N	1150E	1525E	375
		1500N	500E	1050E	550
		1400N	500E	2125E	1000
		1300N	500E	2125E	1075
May 24, 2012	Continue survey. Smoke from forest fires in air.	2000N	0	125E	125
		1900N	0	162.5E	162.5
		1800N	0	287.5E	287.5
		1700N	0	337.5E	337.5
		1600N	0	337.5E	337.5
		1500N	0	500E	500
		1200N	350W	1050E	1400
		1100N	350W	550E	900
		0	1000N	2000N	1000
May 25, 2012	Head to Larder Lake to pickup ATV.				
May 26, 2012	Continue survey.	1600N	1075W	0	1075
		1500N	1075W	0	1075
		1400N	1075W	500E	575
		1300N	1075W	500E	575
May 27, 2012	Continue survey.	2000N	1075W	0	1075
		1900N	1075W	0	1075
		1800N	1075W	0	1075
		1700N	1075W	0	1075
		1000N	350W	550E	900
		900N	350W	550E	900
		0	800N	1000N	200

Date	Description	Line	Min Extent	Max Extent	Total Survey (m)
May 28, 2012	Complete survey and demobilize to Larder Lake.	800N	200W	550E	750
		700N	200W	550E	750
		600N	200W	550E	750
		500N	200W	550E	750
		0	400N	800N	400

Table 1: Survey Log

2.2 PERSONNEL

Bruce Lavalley of Britt, Ontario conducted all the magnetic data collection with Claudia Moraga also of Britt, responsible for the GPS control and GPS waypoint collection.

2.3 SURVEY SPECIFICATIONS

The survey was conducted with a GSM-19 v7 Overhauser magnetometer/VLF with a second GSM-19 magnetometer for a base station mode for diurnal correction.

A total of 31.125 line kilometers of no grid mag and VLF EM was performed between May 17th and May 28th, 2012. This consisted of 2490 magnetometer and VLF EM samples taken at 12.5m intervals.

3. OVERVIEW OF SURVEY RESULTS

3.1 SUMMARY INTERPRETATION

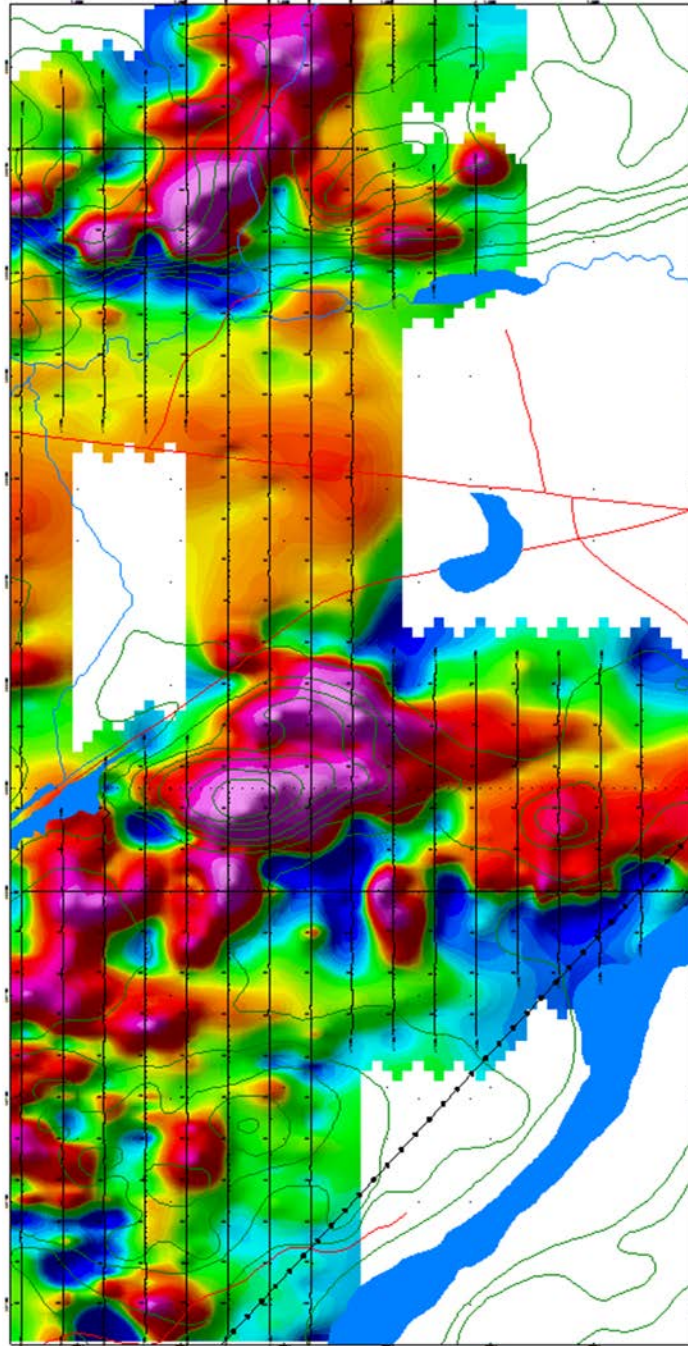


Figure 3: Magnetic Plan over Gillies Property

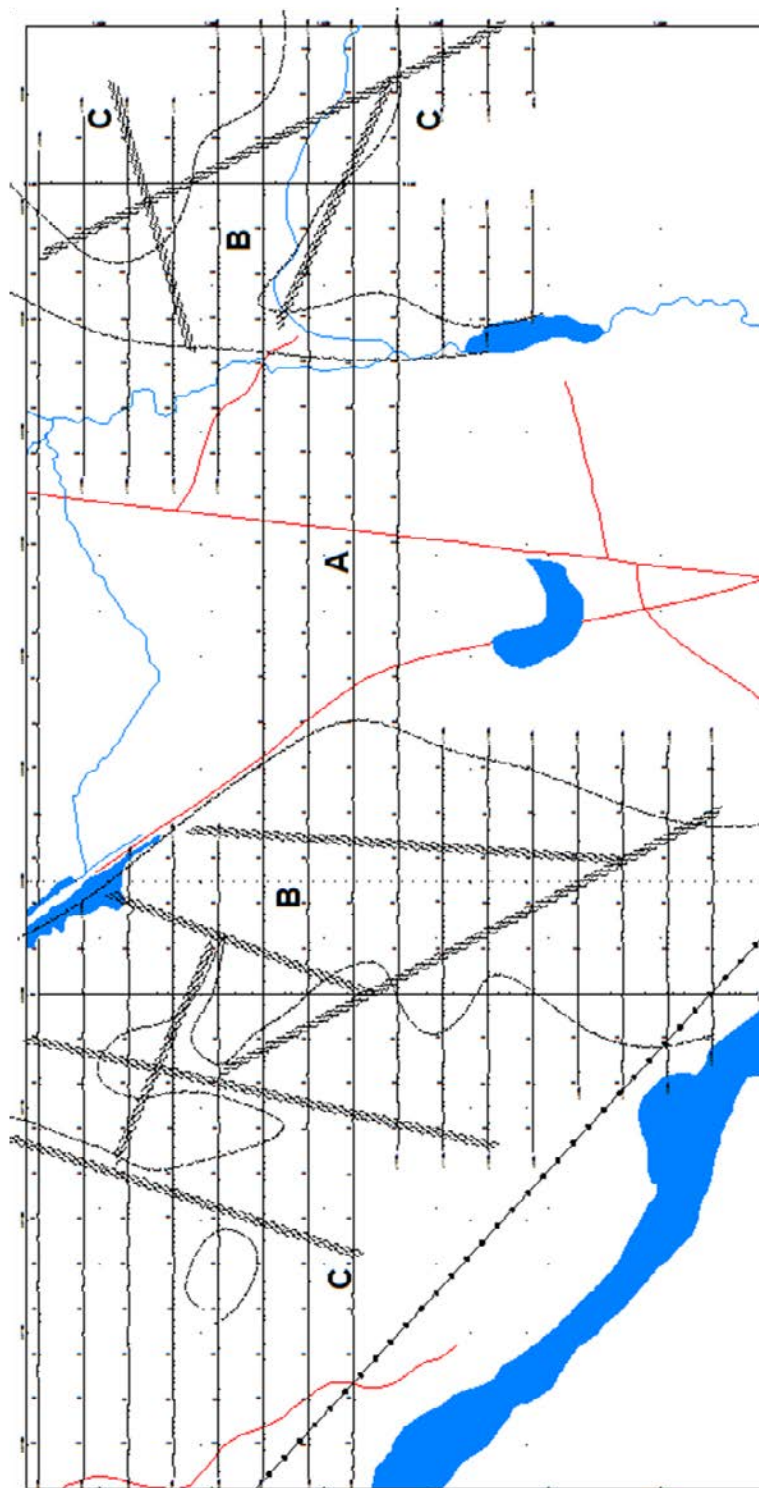


Figure 4: Summary Interpretation of Gillies Property

The survey area exhibited some rugged topography which impeded the progress of the survey. The magnetic survey indicated the presence of various magnetic susceptibilities through the survey area. Generally the survey area appears to be dominated by three magnetic regions.

Region "A" appears to be the most uniform and is located in the central part of the surveyed area. This appears to be an old basin that is predominant and topographically flat. This most likely related to an area of Huronian which is most likely a greywacke. Within this region, there are some north-trending slightly magnetically elevated features. These may indicate the proximity to buried Diabase or mineralized zones.

Either side of magnetic region A appears some intense magnetic responses that have been labeled as region B. These high intensity anomalies resemble those which can be observed from Nipissing Diabase.

Surrounding these 2 regions appears to be some less intense magnetic response (region "C") which is similar that of greenstone. These responses most likely indicate the original magnetic footprint of the area.

The only VLF EM anomalies noted on the property appear to be associated with culture and therefore are not being highlighted. Near the south west corner, the VLF signal appears to get erratic, however, this may be due to culture.

Generally, the areas of interest within this environment are areas where shearing may have taken place and economic mineralization can be found in all the above units. Ore shoots are generally short and highgrade making them difficult to find using geophysics. I would recommend an orientation soil survey in the vicinity of a known mineralized zone. This will indicate the potential success rate of a larger survey. I would also recommend some IP off the known mineralization and prospective areas to help determine the strike length.



APPENDIX A

STATEMENT OF QUALIFICATIONS

I, C. Jason Ploeger, hereby declare that:

1. I am a geophysicist (non-professional) with residence in Larder Lake, Ontario and am presently employed as Geophysical Manager of Canadian Exploration Services Ltd. of Larder Lake, Ontario.
2. I graduated with a Bachelor of Science degree in geophysics from the University of Western Ontario, in London Ontario, in 1999.
3. I have practiced my profession continuously since graduation in Africa, Bulgaria, Canada, Mexico and Mongolia.
4. I am a member of the Ontario Prospectors Association, a Director of the Northern Prospectors Association and a member of the Society of Exploration Geophysicists.
5. I have no interest, nor do I expect to receive any interest in the properties or securities **Outcrop Explorations Limited**.
6. I am responsible for the final processing and validation of the survey results and the compilation of the presentation of this report. The statements made in this report represent my professional opinion based on my consideration of the information available to me at the time of writing this report.

Larder Lake, ON
June 2012

C. Jason Ploeger, B.Sc. (geophysics)
Geophysical Manager
Canadian Exploration Services Ltd.

APPENDIX B

THEORETICAL BASIS AND SURVEY PROCEDURES

TOTAL FIELD MAGNETIC SURVEY

Base station corrected Total Field Magnetic surveying is conducted using at least two synchronized magnetometers of identical type. One magnetometer unit is set in a fixed position in a region of stable geomagnetic gradient, and away from possible cultural effects (i.e. moving vehicles) to monitor and correct for daily diurnal drift. This magnetometer, given the term 'base station', stores the time, date and total field measurement at fixed time intervals over the survey day. The second, remote mobile unit stores the coordinates, time, date, and the total field measurements simultaneously. The procedure consists of taking total magnetic measurements of the Earth's field at stations, along individual profiles, including Tie and Base lines. A 2 meter staff is used to mount the sensor, in order to optimally minimize localized near-surface geologic noise. At the end of a survey day, the mobile and base-station units are linked, via RS-232 ports, for diurnal drift and other magnetic activity (ionospheric and spheric) corrections using internal software.

For the gradiometer application, two identical sensors are mounted vertically at the ends of a rigid fiberglass tube. The centers of the coils are spaced a fixed distance apart (0.5 to 1.0m). The two coils are then read simultaneously, which alleviates the need to correct the gradient readings for diurnal variations, to measure the gradient of the total magnetic field.

VLF Electromagnetic

The frequency domain VLF electromagnetic survey is designed to measure both the vertical and horizontal in-phase (IP) and Quadrature (OP) components of the anomalous field from electrically conductive zones. The sources for VLF EM surveys are several powerful radio transmitters located around the world which generate EM radiation in the low frequency band of 15-25kHz. The signals created by these long-range communications and navigational systems may be used for surveying up to several thousand kilometres away from the transmitter. The quality of the incoming VLF signal can be monitored using the field strength. A field strength above 5pT will produce excellent quality results. Anything lower indicates a weak signal strength, and possibly lower data quality. A very low signal strength (<1pT) may indicate the radio station is down.

The EM field is planar and horizontal at large distances from the EM source. The two components, electric (E) and magnetic (H), created by the source field are orthogonal to each other. E lies in a vertical plane while H lies at right angles to the direction of propagation in a horizontal plane. In order to ensure good coupling, the strike of possible conductors should lie in the direction of the transmitter to allow the H vector to pass through the anomaly, in turn, creating a secondary EM field.

The VLF EM receiver has two orthogonal aeriels which are tuned to the frequency of the transmitting station. The direction of the source station is located by rotating the sensor around a vertical axis until a null position is found. The VLF EM survey procedure consists of taking measurements at stations along each line on the grid. The receiver is rotated about a horizontal axis, right angles to the traverse and the tilt recorded at the null position.

APPENDIX C

GSM 19



Specifications

Overhauser Performance

Resolution: 0.01 nT
Relative Sensitivity: 0.02 nT
Absolute Accuracy: 0.2nT
Range: 20,000 to 120,000 nT
Gradient Tolerance: Over 10,000nT/m
Operating Temperature: -40°C to +60°C

Operation Modes

Manual: Coordinates, time, date and reading stored automatically at min. 3 second interval.
Base Station: Time, date and reading stored at 3 to 60 second intervals.
Walking Mag: Time, date and reading stored at coordinates of fiducial.
Remote Control: Optional remote control using RS-232 interface.
Input/Output: RS-232 or analog (optional) output using 6-pin weatherproof connector.

Operating Parameters

Power Consumption: Only 2Ws per reading. Operates continuously for 45 hours on standby.
Power Source: 12V 2.6Ah sealed lead acid battery standard, other batteries available
Operating Temperature: -50°C to +60°C

Storage Capacity

Manual Operation: 29,000 readings standard, with up to 116,000 optional. With 3 VLF stations: 12,000 standard and up to 48,000 optional.

Base Station: 105,000 readings standard, with up to 419,000 optional (88 hours or 14 days uninterrupted operation with 3 sec. intervals)

Gradiometer: 25,000 readings standard, with up to 100,000 optional. With 3 VLF stations: 12,000, with up to 45,000 optional.

Omnidirectional VLF

Performance Parameters: Resolution 0.5% and range to $\pm 200\%$ of total field. Frequency 15 to 30 kHz.

Measured Parameters: Vertical in-phase & out-of-phase, 2 horizontal components, total field coordinates, date, and time.

Features: Up to 3 stations measured automatically, in-field data review, displays station field strength continuously, and tilt correction for up to $\pm 10^\circ$ tilts.

Dimensions and Weights: 93 x 143 x 150mm and weighs only 1.0kg.

Dimensions and Weights

Dimensions:
Console: 223 x 69 x 240mm
Sensor: 170 x 71mm diameter cylinder
Weight:



Console: 2.1kg
Sensor and Staff Assembly: 2.0kg

Standard Components

GSM-19 magnetometer console, harness, battery charger, shipping case, sensor with cable, staff, instruction manual, data transfer cable and software.

Taking Advantage of a “Quirk” of Physics

Overhauser effect magnetometers are essentially proton precession devices except that they produce an order-of-magnitude greater sensitivity. These "supercharged" quantum magnetometers also deliver high absolute accuracy, rapid cycling (up to 5 readings / second), and exceptionally low power consumption.

The Overhauser effect occurs when a special liquid (with unpaired electrons) is combined with hydrogen atoms and then exposed to secondary polarization from a radio frequency (RF) magnetic field. The unpaired electrons transfer their stronger polarization to hydrogen atoms, thereby generating a strong precession signal-- that is ideal for very high-sensitivity total field measurement. In comparison with proton precession methods, RF signal generation also keeps power consumption to an absolute minimum and reduces noise (i.e. generating RF frequencies are well out of the bandwidth of the precession signal).

In addition, polarization and signal measurement can occur simultaneously - which enables faster, sequential measurements. This, in turn, facilitates advanced statistical averaging over the sampling period and/or increased cycling rates (i.e. sampling speeds).

- The unique Overhauser unit blends physics, data quality, operational efficiency, system design and options into an instrumentation package that ... exceeds proton precession and matches costlier optically pumped cesium capabilities

APPENDIX C

GARMIN GPS MAP 62S



Physical & Performance:	
Unit dimensions, WxHxD:	2.4" x 6.3" x 1.4" (6.1 x 16.0 x 3.6 cm)
Display size, WxH:	1.43" x 2.15" (3.6 x 5.5 cm); 2.6" diag (6.6 cm)
Display resolution, WxH:	160 x 240 pixels
Display type:	transflective, 65-K color TFT
Weight:	9.2 oz (260.1 g) with batteries
Battery:	2 AA batteries (not included); NiMH or Lithium recommended
Battery life:	20 hours
Waterproof:	yes (IPX7)
Floats:	no
High-sensitivity receiver:	yes
Interface:	high-speed USB and NMEA 0183 compatible

Maps & Memory:	
Basemap:	yes
Preloaded maps:	no
Ability to add maps:	yes
Built-in memory:	1.7 GB



Accepts data cards:	microSD™ card (not included)
Waypoints/favorites/locations:	2000
Routes:	200
Track log:	10,000 points, 200 saved tracks

Features & Benefits:	
Automatic routing (turn by turn routing on roads):	yes (with optional mapping for detailed roads)
Electronic compass:	yes (tilt-compensated, 3-axis)
Touchscreen:	no
Barometric altimeter:	yes
Camera:	no
<u>Geocaching-friendly:</u>	yes (paperless)
<u>Custom maps compatible:</u>	yes
Photo navigation (navigate to geotagged photos):	yes
Outdoor GPS games:	no
Hunt/fish calendar:	yes
Sun and moon information:	yes
Tide tables:	yes
Area calculation:	yes
Custom POIs (ability to add additional points of interest):	yes
Unit-to-unit transfer (shares data wirelessly with similar units):	yes
Picture viewer:	yes
Garmin Connect™ compatible (online community where you analyze, categorize and share data):	yes

- *Specifications obtained from www.garmin.com*



APPENDIX D

LIST OF MAPS (IN MAP POCKET)

Posted profiled TFM plan map (1:2500)

- 1) OUTCROP-GILLIES-MAG-CONT

Posted profiled Fraser Filtered VLF EM plan map (1:2500)

- 2) OUTCROP-GILLIES -VLF-NAA

Grid Sketch on Claim Map (1:20000)

- 3) OUTCROP-GILLIES -GRID

TOTAL MAPS=3