A SHORT HISTORY OF 14 FIELD SURVEY SQUADRON ROYAL ENGINEERS.

FOREWORD

I am privileged to have served with 14 Field Survey Squadron RE on two occasions, once as a Troop Sergeant in the period 1958-60 and now as a Troop Officer. Being here on such an auspicious occasion as the 150th Anniversary of our formation I have considered it an honour to have been instrumental in preparing this brief historical record. The information has been gleaned from very many sources among which are the British Museum, the Public Record Office and our own Corps Library at Chatham, places which contain such a wealth of information and places which I would recommend you all to visit when given the opportunity, they really are eye-openers. This record is just one of the ways in which we mark the occasion of our anniversary and I sincerely hope that it will bring back pleasant memories for some.

Should any reader wish to add to or comment on any section then please do so, your material can be included when we reach our next milestone.

Captain C.O.S. Robbins RE 1975

OUR ORIGINS

A regular Corps of Engineers was formed under a Royal Warrant given at St James's on May 26th, 1716, in the second year of George I, consisting of some 28 souls without military rank as we know it today. Their duties were, nevertheless, well defined towards the various engineer projects and all were of officer status.

One such project, resulting from the Scottish rebellion of 1745, was the compilation of a map of the Scottish Highlands. This was to become the forerunner of the Survey of Great Britain and was the first survey carried out under Corps control.

In the month of May 1757, the officers of the Corps were granted military rank, each officer receiving his commission signed by the King, allocating an army rank and dated May 14th.

A further Royal Warrant. Given at St James's on April 25th, 1787, and addressed to "Our Right Trusty and right entirely beloved Cousin and Councillor Charles Duke of Richmond, Lenox and Aubigny, Master-General of our Ordnance", bestowed the Royal title to the Corps.

It is of interest to quote from that Warrant : -

"We are further pleased to direct that Our said Corps of Royal Engineers shall rank in Our Army with Our Royal Regiment of Artillery, and whenever there shall be occasion for them to take post with any other corps of Our Army the post of the Corps of Royal Engineers shall be on the right with the Royal Regiment of Artillery, according to the respective dates of the commissions of the officers belonging to the Royal Regiment of Artillery and Corps of Royal Engineers. And for so doing this shall be, as well unto you as unto all other officers and ministers herein concerned, a sufficient warrant."

So we have our original Royal Engineer officers.

The origins of the Companies of soldiers is to be traced to the Corps of Military Artificers, created at Gibraltar by Royal Warrant dated March 6th, 1772, with the Royal title being bestowed in 1787.

On August 4th, 1812, an order was issued to the then Master-General of the Ordnance, directing that the Corps of Military Artificers should thereafter be styled the Royal Military Artificers or Sappers and Miners

On March 6th, 1813 this complex title was changed to the simpler one of the Corps of Royal Sappers and Miners.

So then we have our original soldiers.

EARLY DAYS

The surveys which were undertaken and executed under Corps control in the eighteenth and nineteenth centuries were very numerous and at the head of the list stood naturally the Ordnance Survey of Great Britain and Ireland. Work which is quoted as to forever remain an indelible record of the energy, zeal and genius of our predecessors. An unprejudiced testimony of this task could be found in the "Rapport de la Commission Militaire sur l'Exposition Universelle de 1867" which calls the Survey, "oeuvre sans precedent et qui devrait servir de modele a toutes les nations civilisees".

Surveys carried out up to the year 1824 were done by officers of the Corps, civilian surveyors and military working parties usually provided from infantry regiments for as yet there had been o survey link between officers and men.

In continuance of the Survey of Great Britain, a committee of the House of Commons recommended in June 1824, the trigonometrical survey of Ireland with the view of apportioning equally the local burdens and obtaining a general valuation of the whole country. The committee reported that it was expedient to use much greater despatch to this work than had been practicable in the trigonometrical survey of England. They recommended that every facility should be given to the Ordnance officers.

Colonel Colby RE, who was at that time the officer in supreme direction of the Survey department, applied to the Duke of Wellington, the Master-General of the Ordinance, for the creation of a Company of Sappers and Miners to be raised specially for survey duties and to be employed on this new work. This application was approved and on December 1st, 1824, a Royal Warrant was issued for the formation of a Company comprising of 62 NCOs and men. This step convincing the authorities of the good sense of employing men of the Corps of Royal Sappers and Miners on survey work was speedily followed by the addition of a second Survey Company, numbered 14.

OUR FORMATION

The Squadron was formed at Chatham as the 14th (Survey) Company, Royal Sappers and Miners under a Royal Warrant dated 4th April 1825.

At Harwich, Hull, Newcastle, Liverpool, Cornwall, Fort George, London and Edinburgh the recruiting was briskly carried on. Recruiting was also carried out at Dublin and some draughtsmen from the Dublin Society School were enlisted. Enlistments also came from the Military Asylum at Chelsea and Hibernian School.

Raised for duty on Survey work the Company with its total complement of 62 men set up its first Headquarters in Belfast on July 15th, 1825.

DRESS OF THE DAY

Early in 1825 the breeches, long gaiters and shoes ceased to be worn by the Corps and in their stead were substituted light blue trousers with scarlet stripes and short wellington boots. The coatee was stripped of its frogging on the breast and the skirts with the slashes sewn transversely on the loins, were lengthened to the swell of the thigh. White turnbacks were added to the inner edges of the skirts and brass grenades united the turnbacks near the bottom of the skirts. The working jacket was simply altered in the collar from the open to the close Prussian fashion and the working trousers were dyed to a deeper grey. These alterations were followed by curtailments of benefits previously enjoyed by the Corps inasmuch as the stockings, shirts and forage caps, annually issued with the clothing, ceased to be provided at public expense. The allowances for oil, emery and shoes were also abolished but in lieu of the shoes the Corps had the advantage of receiving, annually, two pairs of Wellington Boots. The low chaco gave place to one of about ten inches in height, bearing a goose feather of a foot long, in an exploded grenade. The ornaments consisted of scales secured by lion heads, the garter and motto encircling the Royal cipher surmounted by a crown and also a cluster of forked lightning, winged. For protection to the neck in wet weather, a varnished canvas ear cover was attached to the back of the cap. The ornaments of the Staff-Sergeants chaco was of excellent gilt and a band of rich silk, embossed with acorns and oak leaves around the top of the cap, gave it an elegant appearance. The Sergeants ornaments were manufactured of a metal resembling copper and the black bands were of plain narrow silk.

1825-1841

With the Company based at Belfast in July 1825, the triangulation was started in the autumn of that year and the first station was established on the Divis mountain, near Belfast. It was initially required to take an observation to the highest hill of Innishowen, called Slieve Snaght, a distance of some sixty-five miles, to connect the north of Ireland with the western islands of Scotland.

Great interest was taken by the Duke of Wellington in the Survey of Ireland and he was anxious that it should go ahead with all possible speed. He implemented the Company's first increase to establishment of 19 Privates on 1st January 1827 and a further 10 Privates on 13th March 1827, thus bringing the Company strength to a total of 91 men.

Survey parties varied from 2 Sergeants and 23 rank and file to 2 Sergeants and 6 rank and file. Initially, the duties of the Privates did not extend to the scientific and more precise details of the operation but were limited to those subsidiary services which were essential to the rigid execution of the task. Their attention was in fact confined to the labours of the various camps, the building of the triangular tower frames, pickets, trestles and other such services indispensable in obtaining exact alignments of the equipment used. An NCO invariably attended one piece of equipment, another frequently registered the observations, another to alignments and a fourth, with a few men, tended to the base tents and other administration.

In 1839 the trade pay and qualification syllabus for the military surveyors was as follows:

Daily	Class	
Rate		
s. d.		
1 1	1 st	To be capable of surveying for content - flat country.
1 2	2 nd	Surveying the content - hilly country, including the use of the theodolite, taking
		the horizontal and vertical angles, as well as reducing the lines to the horizontal
		planes of the links on the arch.
1 3	3 rd	Competent to register angles and distances, and to make a content plot.
1 4	4 th	Able to compute areas and horizontal and vertical distances and triangles.
1 5	5 th	Able to lay out town lands or parishes for content with skill, so as to prevent
		confusion or unnecessary labour in the subsequent measurements.
1 6	6 th	Fully acquainted with every branch of content surveying, and capable of directing
		parties of content surveyors.
17)		
1 8)	Α	Competent to survey and plot roads etc.
1 9)		
1 10)		
1 11)	В	Competent to draw plans
2 0)		

In all, the triangulation of Ireland was completed in these seventeen years and the 14th (Survey) Company was present for this whole period. The Survey of course involved travel over the whole country and detachments were widely dispersed on the various survey duties. The Company Headquarters was based in the following locations during the period:

1825-38	in Belfast.
1838-40	in Dublin.
1840-41	in Waterford.

History describes the surveyors as that, "They were alike in cities and in wastes, on mountain heights and in wild ravines, had traversed arid land and marshy soil, wading through streams and tracts of quagmire in the prosecution of their duties." Two surveyors of the Company were reported drowned during this time whilst operating in small boats on island surveys.

Of the officers of the Company on its formation and during the Survey of Ireland, little is specifically known although history records that the work was carried out under the superintendence of Major (later Colonel) Colby RE and that working on the Survey were Lieutenants Dawson, Drummond, Larcom, Portlock and Vetch, all of the Corps.

1841-1879

The Company transferred from the base in Ireland to its new base at Preston, England in 1841. Now they were to become involved in detail surveys of Northern England, and in Scotland with secondary and minor triangulation work. As with all surveying, detachments were widely dispersed throughout Northern England, Scotland and Ireland with the Company Headquarters being based at the following locations during the period:

1841-43 in Preston. 1843-44 in York. 1844-50 in Wakefield. 1850-52 in Ripon. 1852-53 in Stornaway. 1853 in Ayr. 1854 in Southampton. 1855 in Edinburgh. 1856-60 in Kelso. 1861 in London. 1862-66 in Dublin. 1866-72 in Guildford. 1872-73 in Tonbridge. 1874 in Chester. 1874-75 in London. 1875-76 in Bedford. 1876-79 in Oxford.

In the London Gazette of October 17th, 1856, it was announced that, "The Queen has been graciously pleased to direct that the Corps of Royal Sappers and Miners shall henceforward be denominated the Corps of Royal Engineers." So ended the separation of the officers and men into two different Corps, a separation which had long been an anomaly and one which had prejudiced the discipline and very harmony of service life. For too long the men had been officered by the Royal Engineers but they themselves had not been known as such. As a consequence of this change, whereas the rank and file had been called Privates in the Royal Sappers and Miners, they were now to be known as Sappers of the Royal Engineers.

As one of four Survey Companies now established, 14th (Survey) Company Royal Engineers were then, involved in the Survey of Great Britain with the addition of revision work and contouring being carried out in Ireland. The levelling was carried out originally by first having the trunk roads levelled from a datum point, the network of lines then determined enabled the intervening spaces to be very easily levelled. The results were afterwards computed from a fixed datum which, in England was taken as the level of mean tide at Liverpool and in Ireland was a point fixed on Poolbeg Lighthouse in Dublin Bay, which indicated at that time the low water mark at spring tide. From these levels the whole Kingdom was contoured at intervals of 100 feet up to 1000 feet and thereafter at intervals of 250 feet.

Additional to these surveys in the home countries, very many detachments were necessary on such things as Boundary Commissions and other small surveys. Detachments from the Company over this period were as follows: -

Survey of North American Boundary

1859 Survey of Boundary between British Possessions of Belize (British Honduras) and the Republic of Guatemala.

1859 Survey of Oregon Boundary, near British Columbia, under the command of Lieutenant S. Anderson RE.

Survey of Jerusalem and levelling from the Mediterranean to the Dead Sea, under the command of Captain C.W. Wilson RE and Lieutenant C. Warren RE.

1864 Survey of Montreal and Quebec, with 10 NCOs and men under the command of Lieutenant Sitwell RE.

North American Boundary Commission, with 13 NCOs and men under the command of Captain S. Anderson RE.

1878 Servian Boundary Commission, under the command of Major C.W. Wilson RE and Lieutenant Ross of Bladensburg, Coldstream Guards.

1878 Eastern Rumelian Boundary Commission.

Montenegran Boundary Commission.

Servian Boundary Commission, under the command of Captain S. Anderson RE.

For the period up to the year 1870, the details of officers commanding the 14th (Survey) Company RE are not specifically known, such was the complexity of the Survey of Great Britain which, with military and civilians working on the same project, totalled some 3000 persons, exclusive of temporary labour such as taping boys. Work achieved by this survey force included triangulation, Photography, zincography, engraving, colouring and electrotyping processes. Known Officers Commanding are names as follows: -

Captain E.R. James RE from 1870 to 1871 (later to retire as a General).

Captain H.S. Palmer RE
Captain J.C. Macpherson RE
Captain A.B. Coddington RE
Captain H.G. Pilleau RE
Captain G.W. Archer RE

from 1872 to January 10th, 1874.
from January 10th, to May 15th, 1874.
from May 15th, 1874 to November 1st, 1875.
from November 1st, 1875, to November 15th, 1876.
from November 15th, 1876, to April 24th, 1879.

1879-1914

The Company returned to Ireland in 1879, where it remained to be stationed until the year 1914. Based at Dublin, the Company was continuously involved in the Survey of Great Britain and the revision of Ireland during this period.

Some idea of the progress that was being made in the complete Ordnance Survey can be gathered by the reports of that time in that field work was being carried out in excess of three million acres per annum and that in the year 1884, OVER 400,000 maps were turned out at Southampton and over 40,000 at Dublin.

As was normal then and still is today, very many detachments were necessary on other smaller surveys and whereas the Company had never yet proceeded abroad as a Company, it had, since the year 1846, sent out detachments of various strengths for the survey of very nearly every British Possession of that time. Detachments from the Company over this period were as follows:

1884	Railway Survey in the Sudan.
1890	Survey of Lagos, with 11 NCOs and men.
1890	Delimitation of Anglo-French Boundary Commission at Gambia, under the command of
	Captain A.H. Kenney RE.
1891	Anglo-French Boundary Commission at Sierra Leone, under the command of Captain
	A.H. Kenney RE.
1891	Anglo-French Boundary Commission at Gold Coast, under the command of Captain J.I.
	Lang RE.
1892	Delimitation of the Anglo-Portuguese Spheres of Influence in Nyasaland, under the
	command of Major J.P. Leverton RE and Captain S.C.N. Grant RE.
1895	Anglo-French Boundary Commissions in Sierra Leone and Gambia.
1895	Determination of difference in Longitude between Greenwich and India by telegraph.
1898	Anglo-Portuguese Boundary Commission, south of the Zambesi, South Africa.
1898	Delimitation of the Anglo-French Frontier on the Southern bank of the Gambia, West
	Africa.
1898	Anglo-German Boundary Commission on the Zambesi, under the command of Captain
	C.F. Close RE.
1900	Anglo-French Boundary Commission at the Gold Coast.
1900	Anglo-French Boundary Commission at the Gold Niger.
1901	Anglo-French Boundary Commission at the Gold Coast.

1901	Special Survey of the Southern Frontier of Abyssinia.
1901	Survey of Gold Fields at the Gold Coast with 1 NCO and 12 Sappers.
1901	Anglo-German Boundary Commission at the Gold Coast.
1902	Anglo-Liberian Boundary Commission at Sierra Leone.
1902	Survey of Gold Fields at the Gold Coast with 1 NCO and 12 Sappers.
1903	Secondary triangulation of Cape Colony.
1903	Survey of Anglo-French Boundary between Niger and Lake Chad.
1903	Survey of Gold Fields at the Gold Coast.
1904	Survey of Berbera-Argan Railway in East Africa ????????
1904	Delimitation of Anglo-Portuguese Frontier North and South of the Zambesi under the
	command of Major R.A.P. O'Shee.
1904	Anglo-German Boundary Commission, East of Lake Victoria.
1904	Anglo-German Boundary Commission from Gold Coast to Togoland.
1906	Anglo-French Boundary Commission in Northern Nigeria.
1906	Anglo-Congolese Boundary Commission in East Africa, under the command of Major
	R.G.T. Bright CMG Rifle Brigade and Captain E.M. Jack RE.
1907	Anglo-German Boundary Commission, Yola Cross River.
1907	Railway Reconnaissance Survey, East Africa and Uganda Protectorate.
1908	Uganda-Abyssinia Boundary Commission.
1908	El Obeid Railway Survey in Kordofan.
1908	Railway Reconnaissance Survey, East Africa and Uganda Protectorate.
1910	Anglo-Belgian-German Boundary Commission, Frontier of Uganda, under the command of Major E.M. Jack RE and Captain the Honourable F.R.D. Prittie, Rifle Brigade.
1910	Road Construction Survey in Ashanti, Northern territories and Gold Coast.
1910	Survey of Mining Concessions in Gold Coast.
1910	Survey Of Tin Fields in Northern Nigeria.
1911	Anglo-Belgian Boundary Commission between Northern Rhodesia and the Congo Free
	State.
1911	Survey Of Tin Fields in Northern Nigeria.
1911	Survey of Concessions in the Gold Coast Colony and Ashanti with a detachment of 13
	Sappers.
1911	Survey of Mining Concessions at the Gold Coast Colony.

The Company also provided four field survey sections for duty in South Africa during the Boer War, in the period from January 15th, 1900, to April 18th, 1902, under the command of Major H.M. Jackson RE, Captain P.H. du P. Casgrain RE and Captain H.W. Gordon RE.

Officers Commanding 14^{th} (Survey) Company RE during this period were as follows : - Note presented differently from in Souvenir Brochure in table : -

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Rank	Name	From	То	
Captain	W.F.H. Spaight RE	April 24 1879	October 15 1882	
Captain (later Major)	W.R. Purchas RE	October 15 1882	March 3 1886	
Captain	M.E. Bisset RE	3 March 1886	1 July 1887	
Lieutenant (Later Captain)	T.B. Shaw RE	1 July 1887	15 December 1893	
Captain	C.C.J. Pery RE	15 December 1893	1 April 1897	
Lieutenant	W.H. Rotheram RE	1 April 1897	1 July 1897	
Captain	C.C. Perceval RE	1 July 1897	15 May 1900	
Captain	W.H. Rotheram RE	15 May 1900	1 October 1902	
Lieutenant (Later Captain)	F.G. Howard RE	1 October 1902	22 September 1907	
Captain	A.J. Woodroffe RE	22 September 1907	15 November 1910	
Captain	E.M.S. Charles RE	15 November 1910	1 March 1912	
Captain	A.A. Crookshank RE	1 March 1912	1914	

1914-1919

This period saw the Company not as surveyors as had been the case since its formation. In the year 1914, Egypt was governed by Great Britain and this authority was sustained by a garrison of some 5,000 men. Strategic importance had been enhanced by the development of oil in the Persian Gulf and any threat to Egypt, particularly to the Suez Canal, was of great importance. At the start of the Great War, although no immediate threat existed to the Canal, the attitude of Turkey, with forces in Syria and Palestine, was causing anxiety and steps were taken to reinforce the garrison pending the defence of the Canal Zone.

The Company was reorganised as the 14th Army Troops Company RE in 1915 and became part of the reinforcement troops being listed in the RE Order of Battle as Corps Troops in Egypt, January 1916; as Corps Troops in the Egyptian Expeditionary Force, July 1916; as Engineer Troops in the Egyptian Expeditionary Force, April 1917; as Corps Troops in the Egyptian Expeditionary Force, September 1918.

They were then to take their part in the victorious campaigns of the Egyptian Expeditionary Force in Egypt, Sinai, Palestine and Syria.

The Company was mobilised to the Middle East, joined the 1st Australian Division at Serapeum on February 22nd, 1916, and took over the partially completed bridgehead defences from the Australian Engineers. Work continued on those defences by the Company and on bridges over the Sweetwater Canal at Fayid. In March 1916, the Company took over the running of the water filtration and pumping plant at their location. In the destruction of water supplies likely to be of use to the enemy in the Sinai Desert, a detachment from the Company accompanied a column to the Wadi um Mukhsheib to empty cisterns and drain pools and other such detachments took place by way of raiding parties in enemy territory.

From August to December of 1916, the Company was engaged on maintaining water supply works, surveying the forward area defences and building roads and shelters. In September it completed a new 20 ton heavy bridge over the Sweetwater Canal at Serapeum West and carried out other bridge construction and maintenance tasks.

Such work continued through 1917, deep water wells were sunk and the Company was responsible, in addition to other work, for much of the water supply from Rafah to Deir el Balah throughout that summer. Another achievement worthy of note were the six bridges built by the Company over the Wadi Ghazzee, the longest of which spanned the 529 foot wide mouth of the Wadi.

Moving into Palestine in 1917 as part of the XXI Corps offensive, the Company reached Ramle on December 2nd and took over the municipal water supply. During the advance, the Company had detachments working separately over a distance of some fifty miles, supplying water to the Divisions of the Corps. As many as twenty pumping plants had been operated simultaneously over a period of four weeks and the average quantity of water supplied daily was 300,000 gallons. The Company was congratulated by the Commander in Chief of the Force, General Sir Edmund Allenby, in person for this work.

Situated at Haifa, Beirut and in the Jordan Valley, the Company continued with road and bridge construction work and in February 1919 was retained in Palestine as part of the Army of Occupation, returning to Egypt in the autumn.

Officers Commanding the 14th Army Troops Company during this period were as follows: -

Major	G,S.C. Cooke RE	1915	1917
Captain	S. Davis RE	May 1917	Early 1918
Captain	E.L. Stainbank RE	Early 1918	August 1918
Captain	E.L. Edge RE	August 1918	Late 1919

1919-1939

The Company, as an Army Troops Company RE, returned from Egypt late in the year 1919 to set up its Headquarters in Dublin once more. It disbanded as an Army Troops Company, reformed at the same time as the 14th Survey Company RE taking up again with the Ordnance Survey of Great Britain.

The Headquarters was moved in late 1920 from Dublin to a new location in Edinburgh where it was to remain until July 1929.

The Ordnance Survey of Great Britain continued with its mixture of civilian and military surveyors and whereas the civilians predominated in number so did the military in superintendence and the Company strength was scattered in small parties countrywide with its officers working at the Southampton headquarters of the Ordnance Survey for the greater part. Military training was evident however and history records that all of the Survey Companies came together at periods ranging from between one and four years for musketry training, drill and duties. Various military courses were attended at Fort Bembridge and at Fort Southwick while technical courses in computing and drawing were attended at Southampton.

In the year 1929, although nominal existence was retained by the Company, it was absorbed into the newly formed Survey Battalion RE at Southampton and lost its independence. Some technical work undoubtedly remained that of survey detachments as in previous years and in addition to the survey work carried out from Southampton there was a more military way of life in that morning and afternoon parades took place, there were daily duties to perform and annual military training to attend. There were also the technical and military courses to attend.

At this time all new recruits into survey carried out their basic military training with the Training Brigade RE at Chatham before moving into the Survey Battalion RE for technical training.

Officers Commanding the 14 th Survey Company during this period were as follows:	Officers Commanding the	14 th Survey Company	during this period	were as follows: -
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Colonel (Retd)	W.A. Gale	1919	1920
Major	F.B. Legh OBE MC	1921	1923
	RE		
Lieutenant	H.E. Pike RE	1924	1926
Lieutenant	J.D. Newman RE	1926	1927
Lieutenant	H. Bagot RE	1927	July 1929

With the Company being absorbed into the Survey Battalion RE there were no Officers Commanding for the period 1929-1939.

1939-1945

As part of the preparations for the Second World War in which the mobilisation scheme for the Royal Engineer Survey Service was put into effect, the Company was reformed in the autumn of 1939 as 14(Corps) Field Survey Company RE.

The move to France of the main body of the British Expeditionary Force, commencing on September 10th, 1939, saw the Company as part of that Force, being specifically a unit of 2 Corps. The Force, which was under French command, occupied a sector on the Belgian frontier, flanked by French and Belgian Armies.

The Company at that time consisted of a Headquarters, two topographical sections, a small drawing section and two printing sections each of which was equipped with one double-demy, hand-fed press, mounted in a trailer. It is of note to record that the print trailers were pulled by Royal Artillery Scammel tractors and that the availability of the tractors and drivers was purely dependant on whether they could be spared by their own unit when movement was necessary. Although the equipment was modified in detail during subsequent years including the addition of a photographic section and substitution of demy presses in specially designed lorries instead of trailers, the Company retained this profile throughout the war.

Technically the Company was tasked with the following requirements in support of 2 Corps:

Revision by ground and air photography methods of the 1:25,000 maps of the Corps area.

Printing of the 1:25,000 maps of the Corps area as no printed stocks had been taken by the force.

Defence work overprints, showing such things as anti-tank ditches, trenches, pill boxes, obstacles and gun emplacements, as defence works grew along the British sector.

Check surveys of the local French triangulation to test the accuracy of published trig lists.

When the German offensive started on May 10th, 1940, the British and French Armies marched into Belgium, with the British reaching the River Dyle on the line from Wavre to Louvain, there to establish a defensive position. The Company moved with 2 Corps to carry out its technical requirements and were soon involved in and around the River Dyle area. However, such was the German thrust directed against the French position that by May 16th, the enemy had penetrated some 40 miles and whereas the British line had held, the threat now to its flank and rear was such that a withdrawal to a line of the River Escaut was ordered. The Company completed it task of the survey on the River Dyle position around Louvain and then retired to the River Escaut line where, in conjunction with the Royal Artillery, it completed surveys for Artillery Fixation Points at the northern end of the river line. The development of the situation however, led to the withdrawal of the British Expeditionary Force to Dunkirk and subsequent evacuation to England in late May, early June 1940.

During the retreat the Company were able to carry out surveys in the areas of Bailleul, Kemmel, Messines and Ploegsteert. Due to Map Depots having been cut off by the German thrusts the only maps available to the Corps were the 1:25,000 sheets already issued or the ones the Company were able to print as they moved back through Belgium and except whilst on the road, the machines hardly stopped turning day and night in an effort to keep pace with rapidly changing situations. Their work was undoubtedly of great value and did not end until they were forced to destroy and abandon their printing vehicles just outside Dunkirk. By June 3rd, 1940, all the forces on the Dunkirk beaches had been embarked for England with the Company having had cause to lose all of its equipment except for a few theodolites carried over by hand.

By the middle of June 1940, all members of the Company had found their way back to Fort Southwick and new arms, personal equipment and clothing were issued. In July 1940, the Company took up station in Harrison's Printing Works of Hayes, Middlesex, as part of the Home Forces of Eastern Command.

With the threat of an impending German invasion the Company was soon heavily involved in Home Defence work on fixations of coastal defence artillery and radar installations which were then being constructed. Printing of map stocks of vital areas and training grounds in Great Britain was a full commitment and this was carried out by using the equipment of the printing works. Shift work was a necessity and with air raids in progress most nights those off duty slept in the shelters in the grounds of the works. The raids were heavy on most nights as was normal for the London area but work only stopped when aircraft were overhead and apart from one or two near misses the unit suffered no damage.

It was during this stay at Hayes that a Photographic Section was first attached to the Company.

In May of 1941 the Company moved to Dunstable to set up its Headquarters in a local brewery. There is reliable information that the brewery had been emptied of its beer but such 'information' comes from Company members at that time. If the Squadron as it is today were to move into a brewery we would doubtless supply the same answer! There was no printing equipment there however and the stay was short.

In August of 1941, the Company moved to Ampthill, being accommodated in half of Ampthill House, the property of the Duke of Bedford's sisters. The grounds of the park in which the house lay were extensive and the Comp[any was able to set up and carry out all types of military field training. New printing vehicles were received and the Company became fully committed once more, not only on local surveys in the Command and the printing of maps of Great Britain but also with revising and printing maps of France, Holland and Germany.

The grounds of Ampthill Park were full of game but shooting and trapping were strictly forbidden. However, the Sergeants Mess were to dine on pheasant or rabbit once or twice a week and the poachers were never caught by the keepers. Such is Sergeants Mess life!

In June of 1943, the Company was again to move, this time to Mold in North Wales, setting up its accommodation in what had been a nursing home approximately one mile from the town. Being completely equipped and self-contained they were able to continue their survey, revision and printing tasks without delay.

With the Supreme headquarters Allied Expeditionary Force formed in January 1944, the Survey organisation, in preparation for the Overlord invasion assault on the French coast, saw 14 (Corps) Field Survey Company in the Order of Battle as part of the British Second Army. Early stages of planning included overprints of enemy defences, intelligence and goings maps in addition to the large quantities of standard maps required for the operation and it was necessary that the Company worked with all speed and at all hours. All was to be done in addition to their training and preparation for the forthcoming campaign and of course, under conditions of the strictest security.

Overlord was launched on June 6th, 1944, and the Company crossed the Channel on D+14, with their vehicles well waterproofed so as to allow them to get ashore from the landing craft and across the beaches. There the Company was established within the Normandy bridgehead, fully occupied on local surveys, fixations and the printing of 1:25,000 maps of the area for all arms. Triangulation data available for Normandy was known to be unreliable and the topographical sections were continuously engaged in the provision of reliable information to the Royal Artillery.

August 1944, saw the Allied breakout from the bridgehead, the overrunning of the Brittany Peninsula and the consequent pursuit of the German Forces through northern France and Belgium. The printing equipment of the Company at that time consisted of two Crabtree demy presses, a photomechanical department and a camera, all lorry mounted and there was a grainer and generator. So great in fact was the amount of 1:25,000 maps to be printed that the allocation of presses to the Company was doubled soon after their arrival in Normandy. That it was of paramount importance for a field survey unit to be able to pack up their equipment and be ready for a quick move was well illustrated here because the Second Army moved no less than six times during the month of September 1944, the longest move being one of 160 miles. The Company moved on five of these occasions and were left behind the Army Headquarters only once and then it was done deliberately in order to avoid disturbing the printing programme on which they were so heavily committed.

October, November and December of 1944 saw a comparative lull in operations and this enabled the printing up of map stocks of German sheets, particularly those required for the planned advance across the Rivers Maas and Rhine. During the winter, additional advantage was taken of static conditions to revise from air photographs the existing large scale city maps of Germany. Despite periods of intense cold, the surveys and printing continued.

The Rhine was crossed during March 1945, followed by deep and rapid advances further into Germany. One particular task of the Company in preparation of the crossing was to cover, by triangulation, a belt about four miles wide along the west bank of the Rhine from Emmerich to Wesel. The object was to check the existing trig data, including points on the east bank, to provide additional control as required by the Royal Artillery and to fix, by intersection, new points on the east side of the river. Methods employed included resection, intersection, new triangulation and traversing.

The rapid advance to the River Elbe saw the Company with the additional task of preparing overprints showing enemy defences and printing of maps ready for the Elbe crossing, the siege of Hamburg and the clearing of the Cuxhaven peninsula.

Following the assault across the River Elbe which commenced in April 1945, Hamburg was to surrender on May 3rd and negotiations were started for the surrender of the entire German Army Group. It was quite clear that the total defeat of the German Army had come and the Company had ably played their part.

Officers Commanding 14 (Corps) Field Survey Company during this period were as follows: -

Major	R.P. Wheeler RE	September 1939	December 1939
Major	G.P.H. Boycott RE	December 1939	August 1942
Major	R.P. Steen RE	August 1942	March 1943
Major	W.J. Phillips MM RE	March 1943	June 1943

Major	A.J. Elsey RE	June 1943	July 1945

1945-1955

Following the surrender in 1945, the Company was to remain in Germany as part of the Occupation Force and with the British Second Army dissolving in June of that year, they became part of 8 Corps. In the period immediately following the surrender, the technical work load was of course reduced to a very great extent and more effort was spent on unravelling the administrative problems that the war had brought and of spending time and effort on much needed equipment and instrument maintenance. At the beginning of this period of peace the Company was located at Moltke Strasse, Bad Salzuflen.

In April of 1945, American troops had entered Bad Oeynhausen, commandeering buildings for use a billets and one of the buildings taken over was a printing works which contained some seven printing presses and associated equipments. This had been taken over from the Americans by a detachment from 15 Map Reproduction Section and early in 1946 it was taken over by the Company and run as a detachment from Bad Salzuflen. This was in fact the very beginning of the Survey production Centre (BAOR) and the detachment was to continue to be operative until late 1951 by which h time, with the steady influx of German technicians over the period from 1946, the detachment ceased and the unit emerged as the Survey production Centre with its own working strength of 140 personnel.

In May 1946, 8 Corps dissolved and the Company became part of 30 Corps. The atmosphere was still very relaxed following the cessation of fighting and although technical tasks were being carried out they were by no means keeping the unit at full working stretch. Reorganisation, maintenance and rehabilitation were the order of the day.

The year 1947 saw the unit redesignated as 14 Field Survey Squadron RE and a move of location, from Bad Salzuflen to a German barracks just outside Minden, took place at the end of that year. The spring of 1949 saw another move, this time to Catterick Barracks in Bielefeld, with the Squadron then under the administrative command of HQ Lubbecke District. The end of the war had seen the repatriation of a number of Squadron personnel who had been called up for service and the Squadron was therefore on a very reduced establishment. It proved to be very short of drivers and a great deal of time was spent in teaching survey tradesmen to drive so as to enable the Squadron to be in a position to fulfil its mobile role.

The Squadron moved from Bielefeld on February 6th, 1951, to Stornoway Barracks in Lemgo with a strength of 5 officers, 28 regular soldiers and 68 national service soldiers. There had been a good deal of administrative tightening up after the relaxed atmosphere of the immediate post-war years and the Squadron were again fully employed on field survey tasks required by Headquarters British Army of the Rhine and 2nd Tactical Air Force and the reproduction of special and standard series maps of Germany.

Another move on October 29th, 1953, saw the Squadron located in Napier Barracks, Dortmund, passing from under the administrative command of HQ Lubbecke District to that of HQ Rhine District but being under the operational command of HQ Northern Army Group. The printing programme of map sheets and plans had realised a total of some 308,000 in 1953.

Reproduction tasks undertaken included the photocopying of captured enemy maps and the colour separation of existing maps for the purpose of making a new 1:25,000 series of Germany. Field tasks included cadastral surveys at Bracht and Dortmund, fixation of radar sites for 2nd Allied Tactical Air Force, field checks of road classifications for a new 1:250,000 series and trig fixations for the Royal Artillery. Air survey work was mainly centred upon the revision of the 1:25,000 maps. Military training, range classifications, Squadron and Northern Army Group exercises were also coming to the fore.

In August 1953, the Squadron had been internally reorganised to give effect to a new survey trade structure. Topographical Surveyors with Topographical Draughtsmen were combined into the Drawing Troop leaving the Trigonometrical Surveyors as the Topographic Troop. This was followed in November 1954 with the Topographic Troop being renamed the Trigonometrical Troop and the Drawing Troop renamed Cartographic Troop. This amendment also authorised a permanent REME increment to the Squadron.

During the period 1953-54, the Squadron took receipt of a power operated double demy proving press together with its associated helio equipment and it also received subtense bar equipment for rapid traversing work. This equipment was authorised to assist the Squadron in fulfilling its role. During training periods trials were carried out with the Number 19 wireless sets to provide material for a report on their suitability to a Field Survey Squadron.

The Squadron strength on April 1st 1955 was; 1 regular officer, 3 national service officers, 79 regular soldiers and 45 national service soldiers and for the first time they featured in the sporting records by winning the Rhine District Minor Units Football Shield and holding third place in the Rhine District Minor Units Athletics Meeting.

Many visitors came to the unit during this period, among whom were the following: -

Major General A.D. Campbell CB,	Engineer in Chief	31 July 1951
CBE, DSO, MC, BA		
Brigadier J.C.T. Willis OBE	Director of Military Survey	5 November 1952
Major General G.N. Tuck CB, CBE	Engineer in Chief	16 June 1953
Major General H.H.C. Sugden CBE,	Chief Engineer Northern Army Group	16 June 1953
DSO		
Major General J.C. Walkley CB, CBE	Engineer in Chief	28 July 1954
Lieutenant General Sir Philip Neame	Representative Colonel Commandant	18 October 1954
VC, KBE, CB, DSO	RE	

Officers Commanding 14 (Corps) Field Survey Company RE or 14 Field Survey Squadron RE during this period were as follows: -

Major	A.J. Relton RE	July 1945	April 1946
Major	W.J. Dynan RE	April 1946	June 1946
Major	R. de Botha RE	June 1946	August 1949
Major	W.A. Seymour RE	August 1949	September 1951
Major	E.A. Hansen MBE RE	September 1951	June 1954
Major	E.G. Wise RE	June 1954	August 1956

1955-1965

The Squadron was to stay in its location at Dortmund during the period from 1955 to 1958 and steps were taker to improve the accommodation by the construction of a new Quartermaster store and a new photographic darkroom. Some principal survey tasks which were carried out included the road classification of eight 1:100,000 and twelve 1:25,000 map sheets which also involved detail checking; 1:25,000 revision by both ground and air survey methods; the coordination of specified ground points for the 2nd Allied Tactical Air Force; the plotting for safe arcs of fire at Todendorf Range and the surveying of missile sites throughout Germany.

A number of minor tasks during 1953 gave cause for seventeen field survey detachments from the Squadron Headquarters and the Reproduction Troop, detached to HQ Buckeburg on Exercise Commonwealth IV and Exercise Full House, to provide daily situation overprints, achieved average run times of a little over two hours for 250 copies in three colours.

The Squadron was now a unit of the 1st (British) Corps, under the technical direction of the Assistant Director of Survey, HQ British Army of the Rhine and in the period 7th to 17th May 1956, took part in Exercise Dominate I, the first joint survey exercise involving British, American, German, Dutch and Belgian survey units. The Trigonometrical and Reproduction Troops also took part in several minor exercises sponsored by HQ 1st (British) Corps, the start of an annual trend which exists today.

Now with a mixed national service and regular strength of 4 officers and 59 soldiers, the Squadron moved from Dortmund on 14th May, 1958, to Nicholson Barracks in Moenchengladbach. This move was seen as a temporary affair only as no proper accommodation was available and living quarters for the men consisted of an ex-Womans Royal Army Corps block. The barracks belonged to Army Field Records and also housed the Survey Production Centre. Such a "temporary affair" was to last some six years and the Squadron remained operational by virtue of its mobile capacity.

During the summer of 1958, the Squadron undertook testing of the new distance measuring equipment, Tellurometer, with tests consisting of two short closed traverses with line lengths limited to 500 metres, one closed traverse with unlimited line lengths and measurements of one long line between first order triangulation stations.

An interesting task during the latter half of 1959 was the detachment from the Trigonometric Troop to provide survey support to the Cambridge University Gornergletscher Glaciological Survey Expedition in Switzerland during the period from 16th October to 18th December. The detachment operated on the Gorner Glacier at altitudes averaging 10,000 feet, making observations and computations relative to the glacier movement. A further detachment continued the survey assistance in Switzerland for an eight week period which commenced in March 1960.

1960 was to see improvements in both the living and technical accommodation at Moenchengladbach and a civilian increment of one storeman and four drivers was written into the establishment to help combat the lack of reinforcements.

The Dominate exercises were an annual affair and Dominate V took place in June 1960, with many other Corps and Squadron exercises now a regular part of the annual programme. Main field and air survey tasks being carried out included the siting of radar and navigational aids for the RAF, the siting of tactical missile sites, revision of trig data lists and road revision of the 1:250,000 series. Reproduction Troop were fully employed on bulk printing of classified maps and in the production of the 1:250,000 series and towards the latter half of 1961, were achieving 400,000 impressions per month.

Prior to Exercise Dominate VI in 1961, Reproduction Troop took receipt of a prototype Crabtree Princess machine trailer and an associated size helio trailer with the forecast of modified equipments to be received at a later date. The replaced demy printing machine equipments were returned to Ordnance in that year. Additionally, and as a result of trials carried out by the Squadron in 1958, three MRA Mark 2 Tellurometers were issued in April 1961 and were used continuously in the field by the Trigonometric Troop on their missile siting programme.

The year 1962 saw the posted strength of the Squadron as 5 officers and 80 soldiers and internal reorganisation resulted in the formation of one Reproduction Troop, one Cartographic Troop, two Field Survey Troops and one Headquarters Troop. Later in the year the Squadron took receipt of one production model Princess machine semi-trailer, one production model guillotine and graining machine semi-trailer, one survey computing vehicle and new range daylight signalling equipment.

Annual military training was now a regular occurrence and emphasis was placed on nuclear, chemical and biological warfare, drill, current affairs, physical training and religious instruction. Exercises were frequent and the technical capacity at full stretch.

More equipment was to be received at the end of 1963 in the shape of a second survey computing vehicle, a Worden gravity meter, two survey Bilby towers, one MRA Mark 2 Tellurometer and production model plate making/proving, camera and darkroom semi-trailers. Further equipments received in 1964 included one Rotaprint machine R 30 SK, twelve C13 wireless sets to replace the four C11 sets which the Squadron were already holding and one three-projector multiplex equipment. On the transport side, ten long-wheelbase landrovers were received to replace the existing Champs.

During 1964, the Squadron moved from Moenchengladbach to Tela Barracks in Rattingen, Dusseldorf, a move which produced very much better technical accommodation for the unit, particularly the Reproduction Troop. The move also brought the Squadron into the same barracks as 3 BAOR Map Depot RE.

In early 1965, another internal change within the Squadron redesignated the two Field Survey Troops as one Topographic Troop. The year saw Topographic Troop carrying out a number of site surveys in support of the Royal Artillery, ground revision of the map of Soltau/Luneberg Training Area and levelling and site surveys of the Sennelager Training Centre in addition to other minor tasks. Cartographic Troop were involved in the plotting of Instrument Landing Systems Calibration charts for

the RAF and bridge site surveys from air photographs whilst Reproduction Troop were engaged in classified and unclassified bulk map printing.

Officers Commanding 14 Field Survey Squadron RE during this period were as follows: -

Major	C. St A. Wylie RE	August 1956	January 1958
T/Major	R.A. Morris RE	January 1958	August 1958
Major	G.A. Neale RE	August 1958	July 1961
Major	G.A. Hardy RE	July 1961	August 1963
Major	R.M. Silberrad MBE RE	August 1963	August 1965

1965-1975

On March 26th, 1965, during the visit to the Squadron of the Representative Colonel Commandant Royal Engineers, Major General R.W. Urquhart CB, DSO, the name of the barracks in which the Squadron was located was changed from Tela Barracks to Roy Barracks. This change was one in honour of General William Roy, an Engineer and one of the first military surveyors.

1965 also saw the Squadron in receipt of eight MRA Mark 3 Tellurometers and field trials were organised with the Rotaprint and multiplex equipment mounted on 2 ton office Sentinel trailers. Several sporting achievements were realised, among which were the following:

Rugby

Winners of the Rhine Area Championships. Semi-finalists in the BAOR Major Units Championships.

Hockey

Winners of the Rhine Area Minor Units Championships. Winners of the RE Games at Osnabruck. Winners of the BAOR Minor Units Championships.

Baskethal

Winners of the Rhine Area Minor Units Championships. Runners-up in the BAOR Minor Unit Championships.

Internal reorganisation again divided the existing Topographic Troop into two Troops following Exercise Dominate X in October 1965 and on this exercise, the use of helicopters, in support of field surveyors on the ground, was practised and considerable emphasis was placed on signals training. In Reproduction Troop, the Rotaprint C30, now mobile was replaced by a C20 machine.

The variety of field survey tasks was continued in support of HQ British Army of the Rhine, 1st (British) Corps and the RAF and these included ground and air revision of Training Area maps, plan control for surveys in support of the Royal Artillery and the fixation of specific sites whilst the Reproduction Troop were, in the main, printing standard series map sheets of Germany.

Further internal reorganisation took place in 1968 and this saw the Squadron in three troops, Topographic, Reproduction and Headquarters Troop with the cartographic personnel forming a section within the Topographic Troop. The surveyors continued to prove themselves as sportsmen by winning the Rhine Area Minor Units Championships at hockey whilst being runners-up at both cricket and football.

Early in 1970 the Reproduction Troop took receipt of a new punch register system and a reduction printer was installed in the cartographic section. During the summer the Squadron was to participate in Exercise Dominate XIII, an exercise which was now to be held every two years rather than annually as in the past.

The Squadron Topographic Troop was committed to a comprehensive field programme of acquiring data relevant to the Cross Country mapping series in 1971, (does this mean Cross Country Mobility CCM?????) in addition to carrying out several site surveys which were to be used for the alignment testing of navigational aids. With the Cartographic Section engaged on multiplex compilation for the plans of the RAF airfields within the theatre and Reproduction Troop fully employed on their standard

series printing programme there seemed little time for other activities. However, combined teams from the Squadron and 3 BAOR Map Depot RE, under the guise of RE Rattingen, won the Rhine Area Minor Units Orienteering Championships, the BAOR Minor Units Soccer Championships and appeared as finalists in the BAOR Small Bore Shooting Championships. The Squadron was also to participate in Exercise Spring Sales, Easter Bonnet and Summer Sales, in their technical role.

The year 1972 saw the installation into the Cartographic Section, now a section within the Squadron Headquarters Troop, of a Wild B8 Plotting Machine, whilst new technical tasks included several ground and air surveys on existing large scale plans, the survey of new training area data and the fixation of Radar sites. Adventure training at Elba was enjoyed by the Squadron sub-aqua club and RE Ratingen were again to record championship sporting achievements in orienteering, rugby, hockey and basketball.

A new concept in mobile map reproduction systems, a requirement in Germany which had long been thought necessary, was to be emphasised in 1973 by Headquarters 1st (British) Corps. This requirement was to comprise of the minimum possible number of specialist survey equipment containers necessary to revise, overprint and reprint the standard series mapping at the scales of 1:50,000 and 1:250,000. The Squadron, in liaison with Survey Branch BAOR and the Directorate of Military Survey were engaged in planning and trials which resulted in the development of Taciprint - Tactical Information Printing System - on field trials during Exercise Dominate XV in May 1974. The equipment developed was to be a reclaimed Signals Office Truck, with an interior designed by the Squadron which included a Rotaprint machine RA 2, Lectrostatic film assembly equipment and a specialist printing down frame, together with their associated materials. That the potential of the equipment was to be recognised could be seen throughout the latter half of 1974 when field trials and study periods were conducted in several parts of the theatre, in addition to numerous exercises during which Taciprint was detached in support of Corps, Division or Brigade Headquarters.

The beginning of 1975 has brought no dramatic changes to the Squadron either in its outlook or in the technical capabilities. The Taciprint, enlarged in system to include photocopying and dyelining techniques has a very full programme for the year ahead. The rugby team has already captured the BAOR Minor Unit Championships Trophy and now awaits their match against the UK champions and the hockey team looks set for a victorious season.

Th. C		41	1	
The Squadron were hosts to ma	ny visitors over	tnis perioa	. among wnom	were the following: -

Brigadier B. St G. Irwin	Director of Military Survey	1968
Major General I.H.F. Boyd, CB, CBE	Representative Colonel Commandant RE	1968
Major General R.L. Clutterbuck OBE, MA	Engineer in Chief	1968
Lieutenant General Sir Noel Thomas KCB, DSO, MC	Representative Colonel Commandant RE	1970
Major General D.R. Carroll OBE	Chief Engineer BAOR	1970
Major General F.G. Caldwell OBE, MC	Engineer in Chief	1970
General Sir Geoffrey Baker GCB, CMG, CBE,	Chief of the General Staff	1970
ADC(Gen)		
Brigadier A. Walmesley White CBE	Director of Military Survey	1972
General Sir Harry Tuzo GCB, OBE, MC	Commander in Chief BAOR	1973
Major General M.E. Tickell OBE, MC	Engineer in Chief	1973
Brigadier J. Kelsey CBE	Director of Military Survey	1973
Major General E.M. Mackay CBE	Chief Engineer BAOR	1973
Major General J. Kelsey CBE	Director of Military Survey	1974

Officers Commanding 14 Field Survey Squadron RE during this period were as follows: -

Major	M.J.K. Davies RE	August 1965	April 1966
Major	G.H. Tomlinson RE	April 1966	March 1968
Major	J.L. Henshaw RE	March 1968	January 1970
Major	D.J. Stevenson RE	January 1970	January 1972
Major	J. Eady RE	January 1972	September 1973
Major	P.E. Andrews RE	September 1973	

Roy Barracks

As has previously been mentioned, the Squadron renamed its barracks as Roy Barracks in March 1965 and the very word "Roy" is now an every day term not only for those in the unit but to very many others, both military and civilian. It is fitting that our brief history should include an individual brief on this illustrious officer whose name we use so freely:

As a Practitioner Engineer in the Corps of Engineers, William Roy, together with David Watson, both surveyors extraordinary, was to work on the compilation of the map of the Scottish Highlands following the Scottish rebellion of 1745. The result of these labours called the Duke of Cumberland's map, is a very large and highly finished, coloured military survey of Scotland, about two inches to the mile and of 38 sheets. It can be seen now at the British Museum as can other examples of his work such as the plans and sketches of coastal England in 1756, prepared when England expected a French invasion.

Granted the military rank of Ensign in 1757, William Roy was to rise to the rank of General and in 1783, was offered and accepted the task of connecting the triangulation already executed in France with similar work in England. His first step was the measurement of a base line on Hounslow Heath. The line was measured by General Roy in 1784 with glass rods and was computed at 27,405,06 feet. When remeasured by steel chain in 1791 it was 27,405,38 feet. When remeasured and when deduced by computation from the Lough Foyle base, through the whole chain of intervening triangulation it came out as 27,405,83 feet. It was then recorded that the feat of Roy was without parallel in any other survey in the world.

The indefatigable Roy was to work on the triangulation until his death in 1788 and such was the loss of this man that the work was brought to a standstill and not resumed until 1791.

APRIL 1975

Today, 14 Field Survey Squadron, Royal Engineers, is based at Roy Barracks, Ratingen on the outskirts of Dusseldorf in the German Ruhr. The peacetime charter puts the Squadron under the technical command of Headquarters British Army of the Rhine, giving survey support to 1st British Corps, Headquarters British Army of the Rhine, Northern Army Group and 2nd Allied Tactical Air Force. By virtue of its location, the Squadron comes under the administrative command of Headquarters Rhine Area.

The Squadron is trained and equipped to undertake field survey, air survey, cartographic and printing tasks and is fully capable of carrying out a complete mapping task from the very first reconnaissance through to the final printed map. The strength of the Squadron is now 5 officers and 86 men and it holds some 72 pieces of transport in addition to the supporting electrical and mechanical equipment.

There are now three Troops, with Headquarter Troop comprising the administrative and support personnel, an air survey section and the Squadron Technical Control group; Reproduction Troop comprising the print, drawing and survey storeman trade personnel with supporting arms and the Topographic Troop comprising the field survey trade personnel with supporting arms.

Present officer posts are as follows: -

Major	P.E. Andrews RE	Officer Commanding
Captain	M.P.B.G. Wilson RE	Second in Command
Captain	C.O.S. Robbins RE	Headquarter Troop Commander
Captain	J. Rylatt RE	Reproduction Troop Commander
Captain	P.R. Wildman RE	Topographic Troop Commander

Our dress today is perhaps not as romantic as that described for the year of 1825. Our field work is carried out by surveyors wearing combat uniform made up of two piece, camouflaged denim material topped with a soft "baseball" cap, no doubt far more comfortable than out predecessors. Those working indoors on the various stages of map production, and the very necessary supporting elements

wear khaki gabardine trousers, open neck shirts and heavy woollen pullovers, whilst the ones involved in machinery, vehicles and the like, wear protective overalls.

Nevertheless, our aims of giving the necessary survey support remains basically the same as in 1825 and whereas our techniques, instruments and operational procedures have necessarily advanced with the times, our work can never be completed and we in the Squadron at present wish every success to the military surveyors who will be operating in future years.

In concluding this brief history of the Squadron, the reader is commended to the following extract from The Times, recorded in 1855 and describing the Corps of Royal Engineers:

"There is a Corps which is often about him, unseen and unsuspected and which is labouring as hard for him in peace as others do in war"

How very true this is of military map-makers.