

## R

Rammer	A tool used by gunners to ram home, into the breech, separated ammunition projectiles (see: <i>Separated Ammunition</i> ). A number of today's guns incorporate automatic powered rammers.
Range	The distance between the battery centre and a target.
Range Finder	An instrument used to determine the distance between an observer and the target.
Range Tables	A series of mathematical tables showing ballistic data (such as the elevation required for a particular range).
Ranging	The procedure to ascertain the range and bearing to a target by observing trial shots, after obtaining rough data from a map (see: <i>Adjustment</i> ).
Rapier Control System	A component of the Rapier Optical Tracker from where the operator can remotely control the functions of the weapon system through a series of switches, buttons and dials. The fire button of the Rapier Fire Unit was located in the Control System.
Rapier Fire Units	The fire units of the complete Rapier weapon system, which include the launcher, the optical tracker and an optional DN181 radar tracker (for a 'blind fire' capability).
Rate of Fire	<p>The named rates of fire, in rounds-per-minute, that a gun may be ordered to fire (if required). The relevant numbers vary with different types of guns. The named rates are:</p> <ul style="list-style-type: none"><li>* Intense.</li><li>* Rapid.</li><li>* Normal.</li><li>* Slow.</li><li>* Very Slow.</li></ul>
Ready	The term used when a gun, or a group of guns (eg. a gun battery), is set-up ready to engage targets.
Reciprocating Sight	A gun sight that is capable of being cross-levelled to compensate for any lack of level of the gun's trunnions (see: <i>Cross-Level</i> ).
Recoil	The rearward movement of the gun's ordinance (ie. barrel, breech and firing mechanisms) upon the gun being fired.
Recoil System	Equipment that absorbs the energy and shock of the gun firing by gradually checking and finally stopping the rearward movement of the recoiling ordinance. Its major components are the buffer and recuperator (see: <i>Buffer and Recuperator</i> ).
Record as Target	An order from the observer to the command post (given before the order 'End of Mission') that the grid reference of the engaged target is to be recorded.

Recuperator	A part of the recoil system which returns the ordnance, after firing, to its former position (ie. it provides 'counter-recoil' to return the ordnance to the 'in-battery' position, or pre-firing position).
Reduced Range	(see: <i>Map Range</i> )
Reduction	The process by which map coordinates are derived for a registered target. Variations for non-standard conditions are removed to give map data, from which the target location is calculated by bearing and distance (this procedure is used in formulating target record information at the completion of a fire mission, if so ordered) (see: <i>Target Records</i> ).
Reference Line	A line marked on the ground in such a way that a director may be set-up on it and angles can be measured from it to other objects from the direction defined by the line. The line can be marked by two or more aiming posts placed in the surrounding area in which the director is to be used (see: <i>Aiming Posts</i> and <i>Director</i> ).
Reference Object	<p>A point from which horizontal bearings can be taken. This can be:</p> <ul style="list-style-type: none"> <li>* A point to which a bearing has been determined.</li> <li>* A point to which the angle from the centre of arc, or the bearing of fire, has been measured and recorded.</li> <li>* A point selected from which to measure angles to other points in a round of angles.</li> <li>* Any point to which the bearing is known.</li> </ul> <p>(see: <i>Centre of Arc</i> and <i>Reference Line</i>).</p>
Regiment	An Artillery regiment is generally a 'battalion' sized unit made-up of a number of relevant sub-units. However, all Australian Artillery regiments belong to the Royal Regiment of Australian Artillery, commonly referred to as 'The Regiment' (see: <i>Royal Regiment of Australian Artillery</i> ).
Regimental Command Post	A unit's regimental command post (RCP) is commanded by the commanding officer, however, the regiment's 2IC (second-in-command) is responsible for the command post's deployment, defence and administration. The RCP is the unit's tactical chain of command and is responsive to fire orders from the commanding officer, the battery commanders and observers, as well as from higher artillery headquarters (see: <i>Adjutant</i> and <i>Regimental Fire Missions</i> ).
Regimental Fire Missions	Fire missions involving more than one of the regiment's gun batteries. Adjustment onto the target is undertaken by one of the batteries and then all the batteries take-part in the engagement of the target.
Regimental Grid	A common geographical grid (for fixation and orientation) shared by all the gun batteries within an artillery regiment (see: <i>Fixation</i> ).

Regimental Headquarters	The headquarters of an artillery regiment consists of the commanding officer (CO), the second-in-command (2IC), the adjutant and the regimental sergeant-major (RSM). All other headquarters staff personnel (eg. the chief clerk, signallers, drivers, etc) are technically members of headquarters battery.
Regimental Master Gunner	The warrant officer class one (WO1) within the Directorate of Artillery. His role includes giving advice to the Director on matters relating to technical gunnery and on matters with regard to the postings and career management of the other ranks (ORs).
Regimental Officers' Basic Course	A course conducted at the School of Artillery for graduating officer cadets before being posted to a regiment or a battery. The Course teaches the new officers the necessary training to enable them to carry-out such duties as a section commander, a command post duty officer and a survey officer (formally titled a 'Young Officers' Course).
Regimental Officers' Gunnery Course	The Artillery-related promotion course attended by Artillery lieutenants to gain the relevant gunner qualifications for promotion to captain.
Regimental Quartermaster-Sergeant	The regimental quartermaster-sergeant (RQMS) is a warrant officer class one who is employed within the regimental quartering store (Q Store).
Regimental Sergeant-Major	<p>The regimental sergeant-major (RSM) is a warrant officer class one and is the senior other ranks member of a regiment and is the main 'link' between the officers and the other ranks, within the regiment. The RSM implements the second-in-command's ammunition resupply plan (for both gun and small arms) within the regiment (which includes the distribution of ammunition to the batteries). He also assists in establishing the regimental headquarters and its local defence.</p> <p>The RSM advises the commanding officer on all matters relating to discipline, and ceremonial and protocol matters within the regiment. He also controls the regimental police and is initially responsible for any of the unit's prisoners-of-war.</p> <p>The RSM may also be available as a duty officer within the regimental command post (RCP).</p>
Regimental Signal Officer	The Regimental Signal Officer (RSO) is the commanding officer's advisor on all technical communications matters. The RSO supervises the standard of fire discipline, voice procedure and artillery fire orders on the regimental radio nets. When not engaged in these technical duties the officer is available as a duty officer in the regimental command post.
Regimental Survey Officer	The Regimental Survey Officer is responsible for producing a survey plan to put the guns of the regiment on the specified survey grid by the 'time to be ready' as laid down in deployment orders. The officer maintains close liaison with any survey report centre or elements of the divisional locating battery in his area, to ensure that data for any necessary change of grid is available to him at the earliest possible moment. At times the officer may be responsible for the survey of sub-units other than those of his

own regiment, in accordance with the overall survey plan within the formation. The officer may be required to provide survey data for observation posts or targets.

Registration Mission	A method, with the firing of guns, to obtain the relevant metrological data when a meteorological message is not available (ie. information relating to air temperature, wind speed and direction, etc).
Registration Point	A datum point of a known grid reference on theatre grid (see: <i>Theatre Grid</i> ).
Rendezvous	The location at which tactical parties or units are to gather for orders, reconnaissance, movement or deployment.
Repeat	<p>The order is used only between an observer and the command post. It has the following meanings:</p> <ul style="list-style-type: none"><li>* During 'Adjustment of Fire': Another round is fired at the previous fired line and elevation. During 'Battery Right/Left' adjustment the order may be coupled with target grid corrections, alterations to the number of guns to fire, the interval and/or the type of ammunition.</li><li>* During 'Fire for Effect': The same number of rounds, at the same method of Fire for Effect, are to be fired again. The order may be coupled with alterations to the number of guns, gun data, interval and/or ammunition. However, if the number of rounds or method of Fire for Effect is changed then the order (Repeat) is not to be used.</li></ul>
Report Guns Empty	(see: <i>Empty Guns</i> )
Representative Colonel Commandant	<p>The Representative Colonel Commandant is the senior Colonel Commandant (see: <i>Colonel Commandant</i>) and his duties include:</p> <ul style="list-style-type: none"><li>* Representing the Regiment on such occasions as may be necessary, in accordance with the Honorary Head of Corps' (HOC) intentions (see: <i>Honorary Head of Corps</i>).</li><li>* Being the channel for communications between the Regiment and the Master Gunner St James's Park, on appropriate matters (see: <i>Master Gunner, St James's Park</i>).</li><li>* Maintaining liaison with the other Colonels Commandant and coordinate their activities on Regimental matters.</li><li>* Being the Chairman of the RAA Regimental Committee and other committees as may be appropriate.</li><li>* Periodically visiting Royal regiment of Australian Artillery units.</li></ul>
Rest	The order is given by the GPO when fire is to be temporarily suspended; no actions are taken by the detachment(s) on the receipt of any orders whilst 'Rest' is in force and the detachments remain at their positions in action. The order is cancelled by either 'Cancel Rest' or a fresh mission (eg. 'Fire Mission ...').
Rifled Breech Loading	A gun with a rifled barrel that has the round loaded through the breech.

Rifled Muzzle Loading	A gun with a rifled barrel that has the round loaded through the muzzle.
Rifling	Spiral grooves cut into the bore of a gun barrel to grip the projectile's driving band, when loaded, and to impart rotation (spin) of the projectile, when the gun is fired, as it passes-up the barrel (see: <i>Driving Band</i> ).
Robotic Bofors System	The RBS 70 ground based air defence weapon system.
Rocking Bar	A basic sighting system by which the gun's sight bracket is tilted forward, by the desired elevation, and then brought-back to the horizontal position by elevating the gun's barrel, which then will have the correct quadrant elevation (for range) applied.
Round	<p>An artillery round is ammunition comprising of the projectile (shell and fuze) together with a propellant and primer.</p> <p>When the propellant is in a (metal) cartridge case the case is either 'fixed' to the projectile (ie. the charge cannot be adjusted and the case cannot be removed from the projectile); 'semi-fixed', the case is attached to the projectile before loading into the gun; or 'separate', the projectile and the case are loaded separately.</p> <p>With 'separated' ammunition the round is the projectile and the propellant is in charge bags (without a cartridge case) and the charge bags are loaded into the breech after the projectile (see: <i>Projectile</i>).</p>
Round of Angles	The process used in artillery survey of relaying on the relevant reference object after measuring horizontal angles in order to ensure that the director's reading scale has not moved and that additionally its lower plate has not been disturbed (see: <i>Director and Reference Object</i> ).
Rounds Complete	The order reported by the battery command post to the observer, and by the detachment commanders to the GPO, on the completion of any method of 'Fire for Effect' (except when a single gun fires a single round).
Rounds per Gun	The number of rounds each gun is to fire during a particular stage of a fire mission (eg. 'Six rounds fire for effect' means each gun fires six rounds (see: <i>Fire for Effect</i> ).
Rounds per Minute	The number of rounds a gun (or guns) is to fire in a minute and the order is given to the gun(s) with a time spacing (eg. to fire five rounds in one minute the order given to the gun(s) would be: "Five rounds fire for effect; one-zero seconds").
Royal Australian Electrical and Mechanical Engineers	(RAEME) The Corps that supports Artillery units with regard to the maintenance and repair of its equipment (eg. guns, rifles, radios, missile launchers, radars, vehicles, etc). All Artillery units contain a RAEME sub-unit.
Royal Regiment of Australian Artillery	The correct title of the Australian Army's Artillery; generally shortened as 'Royal Australian Artillery' (RAA).

Rules of Engagement

Directives, issued by the relevant military authority, that specify the circumstances and limitations and/or the continuation of combat engagement with other forces that are encountered.

Run Out

The position of a gun's barrel prior to firing and following recoil after the gun has fired (see: *Recoil*).