MATH WORDS

*Voici une liste, **non exhaustive**, de connaissances, de vocabulaire de base que les élèves doivent avoir rencontrés au cours des trois années du lycée.*

General Instructions/ words

Calculate; compute; determine; work out ; find out ; solve ; expand; factorize; brace; square brackets; brackets; from this assumption; conclusion; theorem; property; statement; if and only if; if… then; therefore; thus; hence; such that; let… be; proof by contradiction; deduction; CAS; calculator; table; chart; diagram; figure; spreadsheet software; switch; is an element of/ belongs to; finite; provided x is not equal to zero; given that; knowing that; sketch; plot; coordinates; accuracy ; positive; negative; non positive; non negative; with respect to (wrt); cancel; vanish; rule; converse; row; column; array; dimension; perform; state; graph; in terms of; reduce; predict ; likewise; imperial/ avoir du poids units (ounces, fluid ounces; pounds; …)

Geometry

equilateral triangle ; isosceles triangle ; right (angled) triangle; compass; unit circle; parallelogram; quadrilateral; rectangle; set square; ruler; trapezium; rhombus; kite; pentagon; cube; side; pyramid; cuboid; prism; cylinder; cone; octagon; diagonal; unit; tetrahedron; base; height; meter; squared cm; segment (of line); (straight) line; altitude; edge; clockwise; point; midpoint (=middle point); intersection; perpendicular bisector; diameter; Pythagoras' theorem; Pythagoras law; angle bisector; median; area; circumference; volume; anti clockwise; plane; chord; circle **with** centre…**of** radius; angular sector; ray (=half line); face; apex/ vertex (pl. vertices); arc of circle; circumference; cubed cm; the intercept theorem; scalene triangle; square; protractor; semi-circle; Thales theorem; congruent triangles; similar triangles; obtuse angle; acute angle; complementary/supplementary angles; Z/alternate angles; opposite angles at a vertex; corresponding angles; parallel; perpendicular; vector; magnitude; direction; sphere; sine; cosine; opposite angle; inscribed circle; circumscribed circle; concur; (ellipse); adjacent angles; steepness; centre of gravity; orthocentre; locus (pl. loci); bearings; degrees; symmetry in/wrt a line; rotation **about** a point **through** an angle; translation; hypotenuse; right angle; length; width/breadth; area; 3 dimensional geometry; endpoint; special lines; area of a surface; volume; tangent at a point on a circle;

Numbers

Half; third; quarter; one over sixty five ; ratio (is … to); fraction; integer ; whole number; natural number; decimals; rational number ; irrational number ; real number ; set; one/ a half ; one third; one quarter; one fifth; nought (=zero); one hundredth; tenths; dozen; million; billion; ten to the nth power / ten to the power of n; x squared ; x cubed ; (x+1) to the square; counting numbers; square root ; reciprocal; opposite; decimal number; thousand; thousands and thousands; minus (UK)/negative (US) ; infinity; like-terms; exponent; surds; on denominator; numerator; three point five; three and a half; proper fraction; improper fraction; standard/mixed form; open/closed/ semi open interval; p (pi) ; f (phi); digit/figure; per cent; percentage; proportional; proportionality; numeral; raise to a power; round off to the nearest unit/tenth …;

MATH WORDS

Calculations/ Solving equations

Sum up; Add; addition; plus; subtract; difference; subtraction; take away; minus; product; multiply; multiplication; times; multiplied by; divide by; divided by; division; quotient; transpose; greater/bigger/more than; greater/bigger/more than or equal to; smaller/less than; ; smaller/less than or equal to; is equal to/equals; inequality; quadratic/second degree equation; reduce to the same denominator; unknown; solution; root; quadratic formula; (discriminant); cross product; remarkable equality = special product= perfect squares; simultaneous equations (=system of equations); substitution method; elimination method; graphical method; combine; squeeze; completed square form of a trinomial of the second degree; differential equations

Functions & their graphs

Calculus; pronumeral/variable; function that **maps** x **onto** … ; identity function; basic functions ; domain (of definition); linear function; quadratic function; sine function; cosine function; tangent function; square function; cube function; square root function; reciprocal function; gradient/slope ; y-intercept; x-axis; y-axis; x coordinate; y-coordinate; first/ second … quadrant; changes; increasing; decreasing; constant; non increasing; non decreasing; monotonic; non monotonic; continuous; derivative; differentiate; differentiation; rate of change; average rate of change; instantaneous rate of change; limit as x approaches/tends to infinity/A by above/below; horizontal/vertical/slant or oblique asymptote; antiderivative; one-to-one function; intermediate value theorem; image; pre-image; exponential ; natural logarithm; common logarithm; coordinates system = set of axes; rectangular coordinates system; Cartesian plane; parabola; hyperbola; integrate; model; piecewise graph; undefined; maximum value; minimum value; optimum; inverse functions (ln (x) and exp(x) for instance)); convex function; concave function; inflection point; second derivative

Sequences

Term number; term; increasing; decreasing; constant; arithmetic sequence; geometric sequence; common ratio; common difference; arithmetic series; geometric series; mathematical induction (proof by recursion); recursive formula; explicit formula; basis/ starting; inductive step; sandwich/squeeze theorem; sequence= progression; initial term; consecutive terms

Probability/ statistics

Distribution; average = mean or median; lower quartile; upper quartile; minimum; maximum; grouped data; interquartile range; standard deviation; random variable; binomial distribution with parameters n and p; random; experiment ; Bernoulli trial; Bernoulli process; tree diagram;; class interval; range; event; outcome; not A (complementary event); intersection A and B; union A and B; bar chart; histogram; line chart; box and whisker diagram; pie chart; pictogram; collecting data; frequency; relative frequency; n choose k; success; failure; cumulative frequency curve; sample space; conditional probability; probability of A given B; unlikely; certain; even chance; impossible; likely; mutually exclusive events; independent events;

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