## **PROVISIONAL ANSWER KEY**

**Question Paper Code:** 49/2019/OL Category Code: 645/2017 Exam: Tradesman (Fitting)NCA Medium of Question: English Date of Test 03-10-2019 **Technical Education** Department Alphacode А Question1:-Two opposite sides are equal and parallel and four angles are right angles are called as .....? A:-Trapezium **B:-Square** C:-Parallelogram D:-Rectangle Correct Answer:- Option-B Question2:-The main title of the drawing is written in ..... style? A:-Times new roman B:-Arial C:-Courier D:-Gothic Correct Answer:- Option-D Question3:-The system of writing dimensional value over the dimensional line is called as .....? A:-Parallel Dimensioning System **B:-Aligned System** C:-Chain Dimensioning System **D:-Unidirectional System** Correct Answer:- Option-B Question4:-If actual length of 5 mm is drawn in drawing to a length 50 mm. What is the type of scale used? A:-Reduced scale B:-Multiple scale C:-Enlarged scale D:-Plain scale Correct Answer:- Option-C Question5:-What is the interior angle of a regular pentagon? A:-120 degree B:-60 degree C:-72 degree D:-108 degree Correct Answer:- Option-D Question6:-True shape of an inclined plane is shown in ....? A:-Auxiliary view B:-Front view C:-Top view D:-Side view Correct Answer:- Option-A Question7:-Lower critical temperature of high carbon steel while hardening is .....? A:-960 degree B:-900 degree C:-723 degree D:-560 degree Correct Answer:- Option-C Question8:-Which reamer is used for reaming internal metric morse tapered holes? A:-Socket reamer with parallel shank B:-Hand reamer with pilot C:-Taper pin hand reamer D:-Helical fluted reamer Correct Answer:- Option-A Question9:-Face of the pulley is make slightly convex in width. It is called .....?

A:-Flanck **B:-Crowning** C:-Effective diameter D:-Rim Correct Answer:- Option-B Question10:-Which parameter is specific to design hydromotor? A:-Maximum cylinder size B:-Maximum oil saving method C:-Maximum piston size D:-Maximum operating pressure Correct Answer:- Option-D Question11:-Which is the important factor to determine the construction of fixture? A:-Location and clamping **B:-Machining method** C:-Tool guiding and framing D:-Size of work piece and tool Correct Answer:- Option-B Question12:-The following extinguisher is suitable for cotton or other textile fire A:-Water B:-Foam C:-Soda Acid **D:-Dry Chemical** Correct Answer:- Option-A Question13:-The function of a washer is ....? A:-To fill the axial gap B:-To provide cushioning effect C:-To absorb shock and vibrations D:-To provide bearing area Correct Answer:- Option-D Question14:-Name the rivet head used for heavy fabrication work is .....? A:-Flat head B:-Pan head C:-Snap head D:-Mushroom Correct Answer:- Option-B Question15:-Which is the least efficient but most common type of chain hoist available? A:-Screw geared hoist B:-Spur geared hoist C:-Differential hoist D:-Come along chain hoist Correct Answer:- Option-C Question16:-What is the cause of water dripping from the tap even after closed? A:-Defective washer B:-Spindle thread wornout C:-Bend spindle D:-Loose valve Correct Answer:- Option-A Question17:-Which metal alloys is used to make bearing? A:-Tin **B:-Nickel** C:-Chromium D:-Babbit Metal Correct Answer:- Option-D Question18:-Which metal used to make alligator type fastener? A:-G.I. sheet B:-Copper sheet C:-Steel sheet D:-Aluminium sheet Correct Answer:- Option-C

Question19:-Why the small steel wedge is tapped under the machine in lifting operation? A:-To prevent vibration B:-To reduce the weight C:-To accept the crowbar D:-To balance the machine Correct Answer:- Option-C Question20:-Which type of coupling can bring the shaft ends into perfect alignment? A:-Plate coupling **B:-Clamp coupling** C:-Safety coupling **D:-Universal coupling** Correct Answer:- Option-A Question21:-Which among the following material can be cut with a RASP cut file? A:-Copper and Tin B:-Brass and Bronze C:-Leather and Wood D:-Steel Correct Answer:- Option-C Question22:-Which among the following types of chisel used to cutting curved grooves? A:-Flat Chisel **B:-Diamond Chisel** C:-Cross cut Chisel D:-Half round nose Chisel Correct Answer:- Option-B Question23:-An oily floor should be cleaned by ....? A:-Cotton waste **B:-Putting water** C:-putting saw dust or sand D:-Spraying carbon dioxide Correct Answer:- Option-C Question24:-Which one of the thread forms has an included angle of 29 Deg. between the sides of the thread? A:-Gritish association thread **B:-Knuckle thread** C:-Buttress thread D:-ACME thread Correct Answer:- Option-D Question25:-As per Indian standard a special set of slip gauge is used consisting of .....? A:-81 pieces B:-112 pieces C:-120 pieces D:-130 pieces Correct Answer:- Option-B Question26:-A hole, which is not made through full depth of the component is known as .....? A:-Core Hole **B:-Bore Hole** C:-Pin Hole D:-Blind Hole Correct Answer:- Option-D Question27:-Which among the following is an artificial abrasive? A:-Aluminium oxide **B:-Emery** C:-Diamond D:-Corundum Correct Answer:- Option-A Question28:-A grinding wheel is marked: 51 A 46 L 5 V-23. Here what does 5 denote? A:-Kind of bond B:-structure C:-Kind of abrasive D:-Grain size

Correct Answer:- Option-B Question29:-Which type of key is used for coupling a pully with a shaft? A:-Taper Key **B:-Woodruff Key** C:-GIB head Key D:-Flat Saddle Key Correct Answer:- Option-C Question30:-For riveting aluminium sheets, the material of rivet should be used .....? A:-Aluminium **B:-Copper** C:-Brass D:-Wrought Iron Correct Answer:- Option-A Question31:-Which among the following nuts is used for hand vice? A:-Check Nut **B:-Wing Nut** C:-Thumb Nut D:-Hexagonal Nut Correct Answer:- Option-B Question32:-Which one of the following is a chemical property of metals? A:-Corrosion **B:-Conductivity** C:-Hardness D:-Elasticity Correct Answer:- Option-A Question33:-Liquid carburizing is done in a heated salt bath. Which one of the following is not a carburizing salt? A:-Sodium Carbonate **B:-Barium Chloride** C:-Sodium Cyanide **D:-Sodium Sulphate** Correct Answer:- Option-D Question34:-The belt movement upon the outer surface of the Pulleys within the area of contact is known as .....? A:-Slipping **B:-Creeping** C:-Dressing D:-Crowning Correct Answer:- Option-B Question35:-Which one of the following is designed for taking an Axial Thrust Load as well as Radial Load? A:-Thrust Bearing **B:-Needle Bearing** C:-Angular contact Ball Bearing **D:-Roller Bearing** Correct Answer:- Option-C Question36:-.... are used for rotating shafts between centres? A:-Mandrel B:-Chuck C:-Face Plate **D:-Driving Plate** Correct Answer:- Option-D Question37:-A Collate Chuck is meant for the Gripping of? A:-Heavy job **B:-Small jobs** C:-Large dia jobs D:-Small dia jobs Correct Answer:- Option-B Question38:-The measured size of dimension of a component is called? A:-Basic size **B:-Nominal size** C:-Allowed size

D:-Actual size Correct Answer:- Option-D Question39:-Ratchet stop in the micrometer help to .....? A:-Lock the spindle B:-Control the pressure C:-adjust zero error D:-Hold the jobs Correct Answer:- Option-B Question40:-A file used for filing narrow slots notches and grooves is a ....? A:-Knife edge file B:-Half round file C:-Flat file D:-Mill file Correct Answer:- Option-A Question41:-Leveling bolts are used for ....? A:-Supporting the load for machine **B:-Rigidity of machine** C:-Adjusting the height of machine D:-None of these Correct Answer:- Option-C Question42:-The sensitivity of precision spirit level is? A:-0.02 to 0.05 / 100 mm B:-0.02 to 0.05 / 1000 mm C:-0.02 to 0.05 / 200 mm D:-0.02 to 0.05 / 500 mm Correct Answer:- Option-B Question43:-For cutting hard material ..... pitch blade is recommended? A:-10 B:-25 C:-18 D:-14 Correct Answer:- Option-D Question44:-Cast iron is used for manufacturing machine beds because? A:-It can resist more compressive stress B:-It is heavy in weight C:-It is a cheaper metal D:-It is a brittle metal Correct Answer:- Option-A Question45:-Desirable hardness in a file is generally? A:-30 HRC B:-45 HRC C:-60 HRC D:-80 HRC Correct Answer:- Option-C Question46:-Carbide tipped tool used for turning hard material is provided? A:-Side rack angle B:-Zero rack angle C:-Positive rack angle D:-Negative Rack angle Correct Answer:- Option-D Question47:-The plug gauge with go and nogo ends on the same side of the gauge is .....? A:-Double ended plug gauge B:-Progressive plug gauge C:-Adjustable plug gauge D:-Fixed type plug gauge Correct Answer:- Option-B Question48:-Extension rods of inside micrometer are made of? A:-Steel with 800 H.V B:-In side micrometer

C:-Depth Gauge **D:-Tube Micrometer** Correct Answer:- Option-A Question49:-Pig Iron is refined to produce Cast Iron in furnace called? A:-Pig Iron **B:-Cast Iron** C:-Wrought Iron D:-Steel Correct Answer:- Option-C Question50:-Double helical gear are called? A:-Herring Bone Gear **B:-Spur Gear** C:-Bevel Gear D:-Worm Gear Correct Answer:- Option-A Question51:-Tap washers are used for? A:-Preventing vibration **B:-Locking the Nuts** C:-Self Locking D:-None of these Correct Answer:- Option-B Question52:-The best example for Gravity Feed Lubrication is? A:-Ring Lubricator **B:-Wick Feed Lubricator** C:-Grease Gun **D:-Pump Lubricator** Correct Answer:- Option-A Question53:-The machine element which control the sequence of operation in Auto Turret Lathe is? A:-Cam **B:-Gears** C:-Belt and Pulley D:-Screw Rod Correct Answer:- Option-A Question54:-Main alloying element in high speed steel is? A:-Chromium **B:-Vanadium** C:-Tungsten D:-Nickle Correct Answer:- Option-C Question55:-Lathe mandrels can be termed as a? A:-lig **B:-Fixture** C:-Gauge D:-Template Correct Answer:- Option-B Question56:-Which one of the following bearing is used for talking Heavy Axial Load? A:-Trust Bearing **B:-Solid Bearing C:-Journal Bearing D:-Tapered Roller Bearing** Correct Answer:- Option-D Question57:-Which of the following Pulley is used for obtaining different speed ratio of? A:-Jocket Pulley **B:-Solid Pulley** C:-Split Pulley D:-Stepped Pulley Correct Answer:- Option-D Question58:-Hooks Law is associated with? A:-Pressure

**B:-Thermal Expansion** C:-Stress D:-Force Correct Answer:- Option-A Question59:-Which one of the following key may be screwed to the shaft? A:-Saddle **B:-Woodruff** C:-Taper D:-Feather Correct Answer:- Option-D Question60:-The shaft ends are entre drilled for? A:-Supporting jobs between centres B:-Lubricating the dead centre C:-Reducing the weight D:-Assisting counter boring Correct Answer:- Option-A Question61:-Tap washers are used for ....? A:-Preventing vibration B:-Locking the nuts C:-Self locking D:-Fastening structural fabrication work Correct Answer:- Option-B Question62:-The least count of a vernier metric micrometer is A:-0.1 mm B:-0.01 mm C:-0.001 mm D:-0.0001 mm Correct Answer:- Option-C Question63:-A chemical compound of carbon with iron is called? A:-Ferrite **B:-Pearlite** C:-Cementite D:-Austenite Correct Answer:- Option-C Question64:-Bell metal is an alloy of A:-Lead and Tin **B:-Copper and Tin** C:-Copper and Aluminium **D:-Copper and Nickle** Correct Answer:- Option-B Question65:-Which taper on diameter is always 1:20? A:-Metric Taper **B:-Mirse Taper** C:-Brown and sharp Taper D:-Pin Taper Correct Answer:- Option-A Question66:-As per Indian standard the radius of Fillet Gauge are available in size range of? A:-0.6 to 25 mm B:-1 mm to 8 mm C:-5 mm to 20 mm D:-10 mm to 25 mm Correct Answer:- Option-A Question67:-In which of the following punch is used for marking witness mark? A:-Prick Punch 30 Deg. B:-Dot Punch 60 Deg. C:-Centre Punch D:-Bell Punch Correct Answer:- Option-B Question68:-One yard is equal to ....?

A:-32 Inch B:-35 Inch C:-40 Inch D:-36 Inch Correct Answer:- Option-D Question69:-The principle of the sine bar is based on the ....? A:-Algebraic function **B:-Cosine principle function** C:-Analytical geometric function D:-Trigonometric function Correct Answer:- Option-D Question70:-The fly press, pen cap have ....? A:-Single start thread B:-Multi start thread C:-Double start thread D:-Both A & C Correct Answer:- Option-B Question71:-The process of embedding the abrasive grains on lapping is called .....? A:-Rubbing **B:-Lapping** C:-Fixing D:-Charging Correct Answer:- Option-D Question72:-At gas welding, the angle of the nozzle holding welding line is ....? A:-60 to 70 Degree B:-80 to 90 Degree C:-85 to 95 Degree D:-40 to 60 Degree Correct Answer:- Option-A Question73:-The chief alloying elements of carbide tool is....? A:-Carbon and Iron B:-Carbon and Molybdenum Iron C:-Carbon and Vanadium D:-Carbon and Tungsten Correct Answer:- Option-D Question74:-The type of Jig used for location from a bore is the .....? A:-Solid Jig B:-Dril Jig C:-Box Jig D:-Post Jig Correct Answer:- Option-D Question75:-The percentage of carbon content in cast iron is ....? A:-4% to 6% B:-3% to 5% C:-2% to 4% D:-1% to 3% Correct Answer:- Option-C Question76:-The melting point of cadmium is .....? A:-320 degree B:-2620 Degree C:-3380 Degree D:-1495 degree Correct Answer:- Option-A Question77:-In which of the following friction is rather low? A:-Solid Friction **B:-Rolling Friction** C:-Liquid Friction **D:-Gas Friction** Correct Answer:- Option-D

Question78:-The cutting angle of half round scraper is between .....? A:-60 Degree to 80 Degree B:-45 Degree to 65 Degree C:-65 Degree to 75 Degree D:-45 Degree to 68 Degree Correct Answer:- Option-B Question79:-In which of the following metal has its most one important uses for Electro Plating Metallic? A:-Chromium **B:-Nickel** C:-Stainless Steel D:-Aluminium Correct Answer:- Option-A Question80:-Which flame does not have bad effect on metals / weld? A:-Neutral flame **B:-Oxdizing flame** C:-Carburing flame D:-None Correct Answer:- Option-A Question81:-A depression formed at the end of the weld is called? A:-Pinehole **B:-Blowhole** C:-Crater D:-Crack Correct Answer:- Option-C Question82:-In which of the following Anode materials are insoluble? A:-Nickel **B:-Chromium** C:-Copper D:-Zinc Correct Answer:- Option-B Question83:-Percentage of carbon in mild steel? A:-0.1 to 0.3% B:-0.15 to 0.25% C:-0.1 to 0.5% D:-1 to 4 % Correct Answer:- Option-A Question84:-The temperature at which the structure of steel completely changes to Austenite is called? A:-Lower critical temperature **B:-Upper critical temperature** C:-Preheat D:-Soaking time Correct Answer:- Option-B Question85:-Which one of the following is used for gas carburizing? A:-Acetylene **B:-Hydrogen** C:-Methane D:-Oxygen Correct Answer:- Option-C Question86:-Ball bearing are most widely used to all the bearings the width of the ball bearing is A:-Equal to bore diameter B:-Greater than bore diameter C:-Smaller than bore diameter D:-Equal or greater than bore diameter Correct Answer:- Option-C Question87:-The swage block is made of? A:-Malleable castiron **B:-Aluminium** C:-Cast Steel D:-Steel

Correct Answer:- Option-A Question88:-In the pipe assembly the hemp packing is used? A:-For easy engagement B:-To fill the gap between threads C:-To avoid leakage D:-To get tight fitting Correct Answer:- Option-C Question89:-The circlip is the example for in which following type spring? A:-Helical spring **B:-Wire spring** C:-Leaf spring D:-Coil spring Correct Answer:- Option-C Question90:-Approximate hardness of HSS Milling? A:-45 HRC B:-52 HRC C:-62 HRC D:-75 HRC Correct Answer:- Option-C Question91:-An irregularity shaped work piece is turmed on a lathe. Which one of the work holding accessories is used? A:-3 Jaw Chuck B:-4 Jaw Chuck C:-Face Plate **D:-Driving Plate** Correct Answer:- Option-C Question92:-When the threading tool reaches the end of the thread the tool should be? A:-Left in groove and reverse the workpiece. B:-Withdrawn after stopping the machine C:-Withdrawn while the tool is taking cut D:-Withdrawn after removing the workpiece Correct Answer:- Option-C Question93:-Which taper is used on spindle nose of the lathe head stock? A:-Jarno taper B:-Brown share taper C:-Pin Taper D:-Morse Taper Correct Answer:- Option-D Question94:-If the bearing is fitted too tight the internal radial clearance will be .....? A:-Increased **B:-Reduced** C:-Same D:-None of the above Correct Answer:- Option-B Question95:-Wrought Iron is made from A:-Blast Furnace **B:-Crucible Furnace C:-Puddling Furnace** D:-Open Hearth Furnace Correct Answer:- Option-C Question96:-Bending of a rope is known as? A:-Round Turn B:-Bight C:-Loop D:-Knot Correct Answer:- Option-D Question97:-Which of the following is not a part of a taper turning attachment? A:-Guide Block **B:-Sliding Block** C:-Guide Bar

D:-Carrier Correct Answer:- Option-D Question98:-Special purpose material handling equipment are used in? A:-Purpose Layout B:-Line Layout C:-Both A and B D:-None of the above Correct Answer:- Option-B Question99:-Which one of the following is a type of actuator in a Hydraulic system? A:-Pump **B:-Valve** C:-Strainer D:-Cylinder Correct Answer:- Option-D Question100:-Which one of the following tests is carried out after overhauling and reconditioning of Machines? A:-Periodic acceptance test **B:-Geometrical test only** C:-Performance test one D:-None of the above Correct Answer:- Option-A