



QUALIFICATIONS PACK - OCCUPATIONAL STANDARDS FOR GEMS & JEWELLERY INDUSTRY



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Introduction

Qualifications Pack-Polished Grader & Assorter: Advanced

SECTOR: GEMS & JEWELLERY

SUB-SECTOR: Diamond processing

OCCUPATION: Final assorting

REFERENCE ID: G&J/Q4902

ALIGNED TO: NCO-2004/7313.35

Polished grader & assorter (advanced): Also known as Sorter or Assorter or Grader, the polished grader & assorter (advanced) segregates the polished diamonds into multiple groups based on 4Cs.

Brief Job Description: The individual at work mainly works with a loupe to segregate polished diamonds into multiple groups based on its characteristics like cut, carat, clarity or colour. The individual is required to have knowledge of performing measurements of 4Cs on a diamond. The individual is responsible for delivering segregated diamonds with no loss.

Personal Attributes: The job requires the individual to have: attention to details; good eyesight; no colour-blindness; steady hands; ability to work for long hours in sitting position; and a lot of patience.

What are Occupational Standards(OS)?

- OS describe what individuals need to do, know and understand in order to carry out a particular job role or function
- OS are performance standards that individuals must achieve when carrying out functions in the workplace, together with specifications of the underpinning knowledge and understanding

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Qualifications Pack Code		G&J/Q4902	
Job Role	Polished G	rader & Assorter - adv	vanced
Credits(NVEQF/NVQF/NSQF)	TBD	Version number	1.0
Sector	Gems &Jewellery	Drafted on	23/07/13
Sub-sector	Diamond Processing	Last reviewed on	30/07/13
Occupation	Final Assorting	Next review date	15/07/15

Job Role	Polished Grader & Assorter - advanced Also known as 'Assorter' or 'Sorter' or 'Grader'
Role Description	Segregating polished diamonds into multiple groups based on the 4 Cs, by looking at the diamonds through a loupe/eye glass under adequate light
NVEQF/NVQF level	4
Minimum Educational Qualifications Maximum Educational Qualifications	Preferably 10 th Standard Passed
Training	Not Applicable
Experience	Not Applicable
Applicable National Occupational Standards (NOS)	Compulsory: 1. G&J/N4903 Assort polished diamonds 2. G&J/N9930 Maintain IPR 3. G&J/N9931 Coordinate with team and superiors 4. G&J/N9933 Maintain safety Optional: Not applicable
Performance Criteria	As described in the relevant OS units

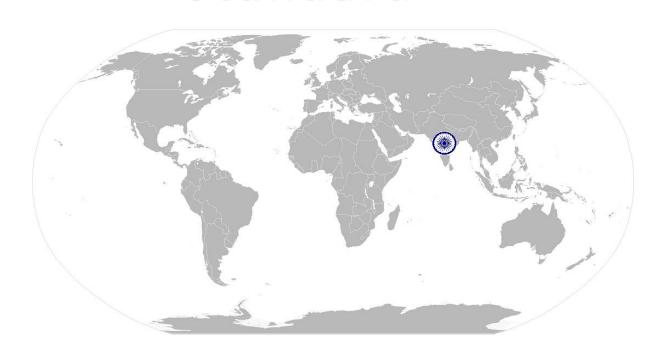






G&J/N4903 Assort polished diamonds

National Occupational Standard



Overview

This unit is the final stage prior to packaging and dispatch in diamond processing. It involves segregation of polished diamonds into multiple groups, assessing each diamond according to its colour, clarity, carat and cut.







Assort polished diamonds

Unit Code	G&J/N4903
Unit Title	Assort polished diamonds
(Task)	
Description	This OS unit is about measuring the 4Cs of a diamond and categorizing it accordingly
Scope	This unit/task covers the following:
Scope	This unit/task covers the following: Receive the packet of polished diamonds from supervisor check the weight and number of stones, w.r.t what is mentioned on the packet remove the diamonds from the packet and place them on the tray under the light clean the diamonds using a cleaning cloth if required Classify broadly use a sieve to classify the diamonds based on its size and shape Sort the diamonds into groups based on 4Cs as required hold the diamond with the help of tweezers under light and view it through a loupe one by one measure the dimensions of the diamond and calculate the required ratios, e.g. table percentage, pavilion depth, etc. assort the diamonds based on its colour (from D to Z) assort the diamonds based on its clarity (from flawless to included) assort the diamonds based on its cut (from excellent to poor) based on the diamond's carat, shape, cut, colour and clarity, segregate it into the relevant category use the microscope to see the diamond clearly (if required) use the UV Box to check the fluorescence of the diamond (if required) use the symmetry analyzer machine to check the cut dimensions (if provided) place assorted the diamonds in the packets, label as per the company's policy and return to the supervisor Report problems about: machine failures tools shortage and their maintenance related issues reasons for anticipated delays that may adversely affect delivery
	 mismatch in the number of diamonds difficulty in grading or classifying a particular diamond (unclear characteristics of a diamond), etc.







Assort polished diamonds

Performance Criteria(PC) w.r.t. the Scope			
Element	Performance Criteria		
Quality of output (assortment)	To be competent, the user/individual on the job must be able to: PC1.accurately measure the 4Cs of a diamond PC2. match his/her judgment with the grading given by GIA or other agencies PC3. deliver in time to next process PC4. complete work with no loss of diamonds		
Productivity	To be competent, the user/individual on the job must be able to: PC5. achieve the productivity in terms of carats or number of pieces as set by the company		
Process Compliances	To be competent, the user/individual on the job must be able to: PC6. comply with relevant legislation, standards, policies and procedures		
Knowledge and Under	standing (K)		
A. Organizational Context (Knowledge of the company / organization and its processes)	 The individual on the job needs to know and understand: KA1. company's policies on: acceptable limits of weight loss; incentives; delivery standards; safety practices and hazards; security and performance measurement KA2. work flow involved in company's diamond processing process KA3. importance of the individual's role in the workflow KA4. reporting structure KA5. issue return procedures followed by the company KA6. typical customer profile and market trends KA7. specialization area of the company (size, clarity, shape, quality, etc. of diamonds) KA8. diamond processing objective of the company, e.g. maximizing yield, maximizing clarity, etc. 		
B. Technical Knowledge	The user/individual on the job needs to know and understand: KB1. identification of a diamond KB2. difference between a natural or a treated diamond KB3. measuring 4Cs of a diamond KB4. grading standards followed by GIA, IGI and HRD KB5. gauging and sieving KB6. use of various scopes in diamond processing KB7. fluorescence in a diamond and its effect KB8. use of symmetry analyzer machine and computer		
Skills (S) [Optional]			
A. Core Skills/ Generic Skills	Reading and writing skills The user/individual on the job needs to know and understand how: SA1. to read the manuals defining different standards as specified by GIA, IGI or HRD SA2. to read descriptions on the diamond packets/ bags		
	SA2. to read descriptions on the diamond packets/ bags SA3. to label each segregated diamond appropriately according to its features		







Assort polished diamonds

	SA4. to document work done for status and performance appraisal		
	Calculation and geometry skills		
	The user/individual on the job needs to know and understand how:		
	SA5. to count the number of diamonds		
	SA6. to measure the proportions of the diamond and calculate different ratios and		
	percentages, e.g. table ratio, pavilion ratio, etc.		
	Communication skills		
	The user/individual on the job needs to know and understand how:		
	SA7. to discuss task, schedules, and work-loads with co-workers and supervisors		
	SA8. to understand instructions and report problems		
B. Professional Skills	Using tools and machines		
	The user/individual on the job needs to know and understand how:		
	SB1. to work with the tools and machines used in assorting process such as		
	weighing scale, UV Box, microscope, gauge, sieve, loupe/eye glass,		
	tripod/table loupe, tweezers and scoop		
	SB2. to maintain tools and machines used		
	SB3. to use technology such as computer and symmetry and proportion analyzer		
	machine with printer for accuracy and efficient working		
	SB4. to adjust lighting to view the diamonds clearly		
	SB5. to work in a safe environment, i.e., without injuries		
	Reducing loss		
	The user/individual on the job needs to know and understand how:		
	SB6. to handle diamonds with care		
	SB7. to minimize damage or loss of any diamond during the sorting process		
	SB8. to report diamond losses via documentation as per company policy		
	SB9. to suggest improvements in order to reduce loss		
	Analytical thinking		
	The user/individual on the job needs to know and understand how:		
	SB10. to assess the 4Cs of the diamond, analyzing various aspects of its dimensions,		
	based on knowledge of grading standards and experience		
	SB11. to derive maximum value from a polished diamond		
	Reflective thinking		
	The user/individual on the job needs to know and understand how:		
	SB12. to work for long hours in a sitting position without health problems		
	Critical thinking		
	The user/individual on the job needs to know and understand how:		
	SB13. to spot process disruptions and delays		







Assort polished diamonds

NOS Version Control

NOS Code	G&J/N4903		
Credits(NVEQF/NVQF/NSQF) [OPTIONAL]	TBD	Version number	1.0
Industry	Gems &Jewellery	Drafted on	23/07/13
Industry Sub-sector	Diamond Processing	Last reviewed on	30/07/13
		Next review date	15/07/15

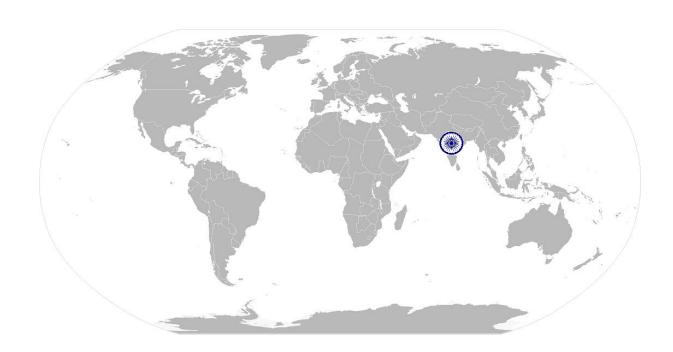






G&J/N9930 Maintain IPR

National Occupational Standard



Overview

This unit is about and respecting intellectual property rights (IPR) of the company's products, policies, procedures and orders.







Maintain IPR

Unit Code	G&J/N9930
Unit Title	
(Task)	Respect IPR of company
Description	This OS unit is about maintaining company's intellectual property
Scope	This unit/task covers the following:
	Ductoot company to latellactual Ducycouty Dialeta (IDD)
	 Protect company's Intellectual Property Rights (IPR) prevent leak of new orders to competitors by reporting on time
	 prevent leak of the worders to competitors by reporting on time prevent leak of the manufacturing processes or the policies followed by the
	company
	be aware of any of company's product patents
	• report IPR violations observed in the market, to supervisor or company heads
Performance Criteria(Po	C) w.r.t. the Scope
Element	Performance Criteria
Respecting IPR	To be competent, the user/individual on the job must be able to:
	PC1. spot plagiarism and report
	PC2. understand rationale of patents and IPR
	PC3. avoid being involved in IPR violations
Knowledge and Unders	
A. Organizational	The individual on the job needs to know and understand:
Context	KA1. company's policies on IPR, plagiarism and order leaks KA2. company's patented products
	KA3. market trends and company's unique product range
	KA4. reporting structure
B. T. doctor	The task that are a the table and a task are also advantaged
B. Technical	The individual on the job needs to know and understand: KB1. basics of patents and IPR laws
Knowledge	KB2. how IPR protection is important for competitiveness of a company
	NB2. How if it protection is important for competitiveness of a company
Skills (S) [Optional]	
A. Core Skills/	Communication skills
Generic Skills	The user/individual on the job needs to know and understand how:
	SA1. to effectively communicate any observed IPR violations or leaks
B. Professional Skills	Decision making
	The user/individual on the job needs to know and understand when and how:
	SB2. to report sources of IPR violations
	Reflective thinking
	The user/individual on the job needs to know and understand how:
	SB3. to learn from past mistakes and report IPR violations on time
	Critical thinking
	The user/individual on the job needs to know and understand how:
	SB4. to spot signs of violations and alert authorities in time
	Critical thinking The user/individual on the job needs to know and understand how:







Maintain IPR

NOS Version Control

NOS Code	G&J/N6001		
Credits(NVEQF/NVQF/NSQF) [OPTIONAL]	TBD	Version number	1.0
Industry	Gems &Jewellery	Drafted on	23/07/13
Industry Sub-sector	Diamond Processing	Last reviewed on	30/07/13
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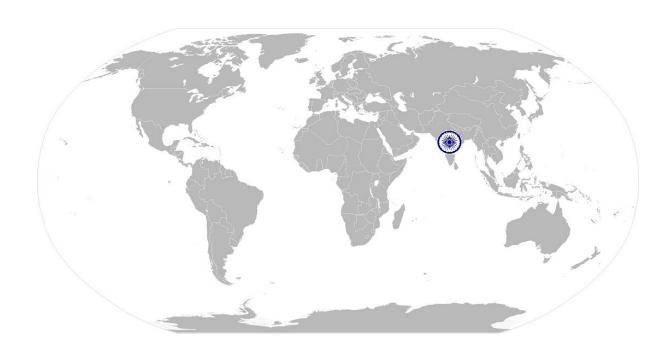






Coordinate with team and superiors

National Occupational Standard



Overview

This unit is about the work ethics, team work, and level of communication with colleagues or clients in the diamond processing industry. It determines the ability to work as a team member, share work and multi-task in order to achieve the required deliverables on schedule.







Coordinate with team and superiors

Unit Code	G&J/N9930		
Unit Title	Interact with colleagues and seniors		
(Task) Description	This OS unit is about communicating with colleagues and seniors in order to maintain smooth ad hazards free work flow		
Scope	This unit/task covers the following: Interact with supervisor to: receive work instructions and raw materials from reporting supervisor communicate to reporting supervisor about process flow improvements, product defects received from previous process, repairs and maintenance of tools and machinery as required communicate any potential hazards or expected process disruptions handover completed work to supervisor Interact with colleagues within and outside the department to: work as a team with colleagues and share work as per their or own work load and skills work with colleagues of other departments communicate an discuss work flow related difficulties in order to find solutions with mutual agreement receive feedback from QC and rework in order to complete work on time		
Performance Criteria(P	C) w.r.t. the Scope		
Element Interaction with supervisor	Performance Criteria To be competent, the user/individual on the job must be able to: PC1. understand the work output requirements PC2. comply with company policy and rule PC3. deliver quality work on time as required by reporting any anticipated reasons for delays		
Interactions with colleagues and other departments	To be competent, the user/individual on the job must be able to: PC4. put team over individual goals PC5. conflicts resolution and multi-tasking		
Knowledge and Understanding (K)			
A. Organizational Context (Knowledge of the company / organization and its processes)	The individual on the job needs to know and understand: KA1. company's policies on personnel management KA2. work flow involved in company's diamond processing KA3. importance of the individual's role in the workflow KA4. reporting structure		







G&J/N9930 Coordinate with team and superiors

В.	Technical	The individual on the job needs to know and understand:		
Knowledge		KB1. how to communicate effectively		
		KB2. how to build team coordination		
Ski	lls (S) [Optional]			
A.	Core Skills/	Teamwork and some multitasking		
	Generic Skills	The individual on the job needs to know and understand how:		
		SA1. to share work load as required		
		SA2. to deliver product to next work process on time		
B.	Professional Skills	Decision making		
		The individual on the job needs to know and understand:		
		SB1. how to report potential areas of disruptions to work process		
		SB2. when to report to supervisor and when to deal with a colleague depending on		
		the type of concern		
		Reflective thinking		
		The individual on the job needs to know and understand:		
SB3. how to improve work process				
	Critical thinking			
		The individual on the job needs to know and understand:		
		SB4. how to spot process disruptions and delays		







Coordinate with team and superiors

NOS Version Control

NOS Code	G&J/N9930		
Credits(NVEQF/NVQF/NSQF) [OPTIONAL]	TBD	Version number	1.0
Industry	Gems &Jewellery	Drafted on	27/07/13
Industry Sub-sector	Diamond Processing	Last reviewed on	30/07/13
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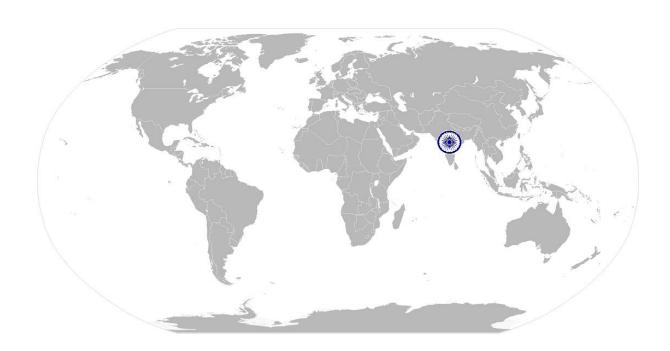






Maintain safety

National Occupational Standard



Overview

This unit is about the worker's commitment towards reporting potential hazards and containing accidents in order to make the work environment safe for self and colleagues.







Maintain safety

	Withittin Burety
Unit Code	G&J/N9933
Unit Title (Task)	Maintain safety at work
Description	This OS unit is about being aware of and communicating potential hazards and dangers of accidents on the job
Scope	 This unit/task covers the following: Understand potential sources of accidents to avoid accidents related to use of potentially dangerous chemicals, gases, sharp tools and hazards from machines like rotating scaife, lasers, heating ovens, etc. Use safety gear to avoid accidents wear safety gear such as goggles, mask, gloves , jacket , etc. as prescribed for the job
	 Understand the safety procedures followed by the company such as fire drills, emergency/ evacuation procedures, first aid, etc., which will be helpful in case of an emergency Communicate to reporting supervisor about: process flow improvements to reduce anticipated or repetitive hazards mishandling of tools, machines or hazardous materials electrical problems that could result in accident

Performance Criteria(PC) w.r.t. the Scope

Element	Performance Criteria			
Understanding of	To be competent, the user/individual on the job must be able to:			
potential sources of	PC1. spot and report potential hazards on time			
accidents and	PC2. follow company policy and rules regarding hazardous materials			
communicating	PC3. deliver quality work on time as required by reporting any anticipated reasons			
	for delays			
Using safety gear	To be competent, the user/individual on the job must be able to:			
	PC4. understand which safety gear must we used for a particular task			
Understanding of	To be competent, the user/individual on the job must be able to:			
safety procedures	PC5. understand and follow the evacuation procedure properly during a fire drill			
	PC6. provide first aid to self or others in case of emergency			

Knowledge and Understanding (K)

Kilowieuge allu Ollueis	tanung (K)			
A. Organizational	The individual on the job needs to know and understand:			
Context	KA1. company's policies on handling: harmful chemicals and sharp tools, safety and			
(Knowledge of the company / organization and its processes)	hazards of machines, fire safety/drill, first aid and, disposal of harmful chemicals and materials KA2. work flow involved in company's diamond processing KA3. importance of the individual's role in the workflow KA4. reporting structure			







Maintain safety

Fechnical Knowledge					
	environmental norms or as per company policy				
lls (S) [Optional]					
Core Skills/	Communication skills				
Generic Skills	The individual on the job needs to know and understand how:				
	SA1. to effectively communicate the danger				
Professional Skills	Decision making				
	The individual on the job needs to know and understand:				
	SB1. importance of reporting potential sources of danger				
	SB2. appropriate actions to be taken in the event of an accident				
	SB3. procedure for disposing of hazardous materials, safely and following				
	environmental guidelines				
	Reflective thinking				
	The individual on the job needs to know and understand how:				
	SB4. to learn from past mistakes regarding use of hazardous machines, tools or				
	chemicals				
	Critical thinking				
	The individual on the job needs to know and understand:				
	SB5. how to spot danger				
	SB6. procedure to follow in the event of a fire or other hazard				
	(Is (S) [Optional] Core Skills/ Generic Skills				







Maintain safety

NOS Version Control

NOS Code	G&J/N9933				
Credits(NVEQF/NVQF/NSQF) [OPTIONAL]	TBD Version number 1.0				
Industry	Gems &Jewellery	Drafted on	27/07/13		
Industry Sub-sector	Diamond Processing	Last reviewed on	30/07/13		
		Next review date	15/07/15		





Keywords /Terms	Description					
Sector	Sector is a conglomeration of different business operations having similar business and interests. It may also be defined as a distinct subset of the economy whose components share similar characteristics and interests.					
Sub-sector	Sub-sector is derived from a further breakdown based on the characteristics and interests of its components.					
Occupation	Occupation is a set of job roles, which perform similar/ related set of functions in an industry.					
Function	Function is an activity necessary for achieving the key purpose of the sector, occupation, or an area of work, which can be carried out by a person or a group of persons. Functions are identified through functional analysis and form the basis of OS.					
Sub-function	Sub-functions are sub-activities essential to fulfil the achieving the objectives of the function.					
Job role	Job role defines a unique set of functions that together form a unique employment opportunity in an organisation.					
Occupational Standards (OS)	OS specify the standards of performance an individual must achieve when carrying out a function in the workplace, together with the knowledge and understanding they need to meet that standard consistently. Occupational Standards are applicable both in the Indian and global contexts.					
Performance Criteria	Performance criteria are statements that together specify the standard of performance required when carrying out a task.					
National Occupational Standards (OS)	NOS are occupational standards which apply uniquely in the Indian context.					
Qualifications Pack (QP)	QP comprises the set of OS, together with the educational, training and other criteria required to perform a job role. A QP is assigned a unique qualifications pack code.					
Unit Code	Unit code is a unique identifier for an Occupational Standard, which is denoted by an 'N'					
Unit Title	Unit title gives a clear overall statement about what the incumbent should be able to do.					
Description	Description gives a short summary of the unit content. This would be helpful to anyone searching on a database to verify that this is the appropriate OS they are looking for.					
Scope	Scope is a set of statements specifying the range of variables that an individual may have to deal with in carrying out the function which have a critical impact on quality of performance required.					
Knowledge and	Knowledge and understanding are statements which together specify the					
Understanding	technical, generic, professional and organisational specific knowledge that an individual needs in order to perform to the required standard.					
Organisational Context	Organisational context includes the way the organisation is structured and how it operates, including the extent of operative knowledge managers have of their relevant areas of responsibility.					
Technical Knowledge	Technical knowledge is the specific knowledge needed to accomplish					





	specific designated responsibilities.
Core Skills/ Generic Skills	Core skills or generic skills are a group of skills that are the key to learning and working in today's world. These skills are typically needed in any work environment in today's world. These skills are typically needed in any work environment. In the context of the OS, these include communication related skills that are applicable to most job roles.
Keywords /Terms	Description
IPR	Intellectual Property Rights
NOS	National Occupational Standard(s)
NVQF	National Vocational Qualifications Framework
NSQF	National Qualifications Framework
NVEQF	National Vocational Education Qualifications Framework
QP	Qualifications Pack

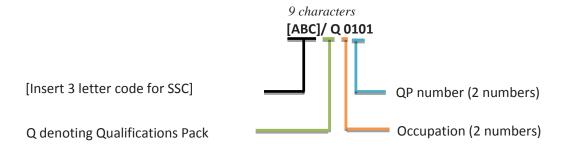




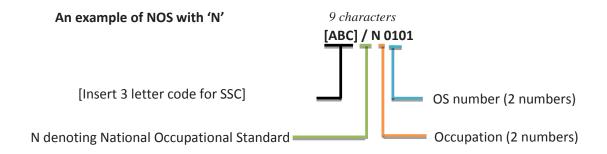
Annexure

Nomenclature for QP and NOS

Qualifications Pack



Occupational Standard



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The following acronyms/codes have been used in the nomenclature above:

Sub-sector	Range of Occupation numbers
Handmade gold and gems-set jewellery	01-20
Cast and diamond-set jewellery	21-40
Diamond processing	41-60
Gemstone processing	61-80
Jewellery retailing	81-98

Sequence	Description	Example
Three letters	Industry name	G&J
Slash	/	/
Next letter	Whether Q P or N OS	Q
Next two numbers	Next two numbers Occupation code	
Next two numbers	OS number	09

Qualifications Pack for Polished Diamond Grader & Assorter (Advanced)



CRITERIA FOR ASSESSMENT OF TRAINEES

<u>Job Role</u> Polished Diamond Grader & Assorter (Advanced)

Qualification Pack G&J/Q4902

Sector Skill Council Gem & Jewellery

Guidelines for Assessment

- 1. Criteria for assessment for each Qualification Pack will be created by the Sector Skill Council. Each Performance Criteria (PC) will be assigned marks proportional to its importance in NOS. SSC will also lay down proportion of marks for Theory and Skills Practical for each PC.
- 2. The assessment for the theory part will be based on knowledge bank of questions created by the SSC.
- 3. Individual assessment agencies will create theory question papers for candidates at every examination/training centre. (as per assessment criteria below)
- 4. Individual assessment agencies will create practical tests for skill evaluation for candidates at every examination/training centre. (as per assessment criteria below)
- 5. To pass the Qualification Pack, every candidate should score a minimum of 50% in theory and 70% in practical to successfully clear the assessment.
- 6. In case of successfully passing only certain number of NOS's, the candidate is eligible to take subsequent assessment on the balance NOS's to pass the Qualification Pack.

			Marks A		Allocation
		Total Marks (80+20)	Out Of	Theory	Skills Practical
1. G&J/N4903 Assort polished diamonds	PC1. Accurately measure the 4Cs of a diamond		25	5	20
	PC2. Match his/her judgment with the grading given by GIA or other agencies		25	5	20
	PC3. Deliver in time to next process		5	0	5
	PC4. Complete work with no loss of diamonds	75	10	0	10
	PC5. Achieve the productivity in terms of carats or number of pieces as set by the company		5	0	5
r	PC6. Comply with relevant legislation, standards, policies and procedures		5	0	5
		Total	75	10	65
2.G&J/N9930 Maintain IPR	PC1. Spot plagiarism and report	9	3	1	2



Qualifications Pack for Polished Diamond Grader & Assorter (Advanced)



	PC2. Understand rationale of patents and IPR		4	2	2
	PC3. Avoid being involved in IPR violations		2	1	1
		Total	9	4	5
3. G&J/N9931 Coordinate with others	PC1. Understand the work output requirements		2	1	1
	PC2. Comply with company policy and rule		1	0	1
	PC3. Deliver quality work on time as required by reporting any anticipated reasons for delays	8	1	0	1
	PC4. Put team over individual goals		2	1	1
	PC5. Conflicts resolution and multitasking		2	1	1
		Total	8	3	5
4. G&J/N9933 Maintain safe work environment	PC1. Spot and report potential hazards on time	8	4	2	2
	PC2. Follow company policy and rules regarding hazardous materials		3	1	2
	PC3. Deliver quality work on time as required by reporting any anticipated reasons for delays		1	0	1
		Total	8	3	5