IAHCSMM
Instrumental to Patient Care®

CRCST Exam Content Outline

Revised Nov 2013 **3 Pages**

The CRCST Exam Content Outline was created through the 2012 job task analysis and outlines the specific areas of knowledge necessary to perform the duties of a Central Service Technician. The Content Outline also details the percentage weight for each of the seven sections which comprise the CRCST Exam. The higher the percentage weight, the more heavily the questions in that area will affect your overall test score.

1 CLEANING, DECONTAMINATION, AND DISINFECTION [PERCENTAGE WEIGHT: 20%]

a **Safety Standards**
- i OSHA/Blood Borne Pathogens
- ii Microbiology (e.g. cross contamination, microbial transmission, chain of infection)
- iii Where to obtain information
- iv Body Mechanics
- v Sharp Safety
- vi Equipment Operation
- vii Where to find MSDS
- viii Location & Operation of eyewash station
- ix Location & Operation of shower
- x Ergonomics (e.g. work-flow)
- xi Chemical Safety
- xii Traffic flow
- xiii How to contain, transport, and receive soiled items into decontamination or soiled utility rooms

b **Personal Protective Equipment (PPE)**
- i What PPE to put on
- ii How to put PPE on
- iii How to take PPE off
- iv When to change PPE
- v How to dispose of PPE
- vi Hand-washing

c **Temperature & Humidity of the Work Environment**
- i Standards for temperature
- ii Standards for humidity
- iii How to record
- iv Frequency to record
- v What to do if not within the parameters

d **Preparing Work Area For Decontamination**
- i Correct cleaning agent or chemicals for cleaning process
- ii Supplies Needed (e.g. brush, towels)
- iii Equipment (e.g. compressed air, water)
- iv How to mix chemicals following the manufacturer's Instructions For Use (IFU) (e.g. dilution)
- v How to check & replenish chemicals in equipment
- vi How to properly dispose of chemicals
- vii How to determine the correct chemicals for the equipment

e **Quality Tests**
- i Efficacy testing process for washers
- ii Efficacy testing process for ultrasonic
- iii Efficacy testing process for Automated Endoscope Reprocessor (AER)
- iv Efficacy testing process for cart washer
- v Water quality test process
- vi When to test
- vii How to interpret tests
- iv Water pressure
- v Location of outlets: on/off, regular, and emergency
- vi Chemical feed line processes
- vii How to clean & test spray arms
- viii How to check manifolds & baskets
- ix Operator's manual (where to find, how to use)
- x How to close equipment doors & proper operation of doors

f **Troubleshooting Cleaning Equipment**
- i Who to call if malfunction or have a question
- ii How to identify and respond to alarms
- iii How to clean strainers/drains
- iv Water pressure
- v Location of outlets: on/off, regular, and emergency
- vi Chemical feed line processes
- vii How to clean and test spray arms
- viii How to check manifolds and baskets
- ix Operator's manual (where to find, how to use)
- x How to close equipment doors & proper operation of doors

g **Disposable Items from Non-Disposable Items**
- i Difference between disposable & non-disposable items (e.g. single-use versus re-useable, laparoscopic tips)
- ii Third-party vendor items (e.g. identification of items to return to third-party vendors)
- iii Disposable & non-disposable linens
- iv Process of broken & repairable instrumentation
- v How to dispose of sharps & non-reprocessed items (e.g. biohazards versus non-regulated trash, sharps container)

h **Preparing Items for Decontamination**
- i How to disassemble instrument
- ii Manual & mechanical cleaning according to IFU
- iii Where the IFU is located
- iv Methods for reducing the risk of Toxic Anterior Segment Syndrome (TASS)
- v How to load items into the equipment
- vi How to clean strainer/drains
- vii Special precautions for Creutzfeldt-Jacob Disease (CJD) instruments

i **Cleaning & Decontaminating Non-Disposable Items**
- i Location of IFU
- ii Proper opening & positioning of instruments
- iii Operation times for processes (e.g. manual & mechanical)
- iv Operation of light & magnification devices
- v When & how to use water & air
- vi What goes in each sink (e.g. two or three sink method)
- vii Soak process
- viii Selection of correct brush & size
- ix Brush care
- x Prevention of aerosols
- xi Proper loading of equipment

j **Selecting Appropriate Disinfectant**
- i How to mix & test chemicals
- ii Three levels of Spaulding Classification (e.g. non-critical, semi-critical, critical)
- iii Documentation of chemical testing
- iv Disinfectant family (what they do, how to use)

k **Disinfecting Instruments & Equipment**
- i Use of correct disinfectant
- ii Exposure times
- iii Rinsing

l **Transferring Items to Preparation Area**
- i Air exchange (e.g. negative pressure, positive pressure)
- ii How to perform visual check for cleanliness

2 PREPARATION & PACKAGING [PERCENTAGE WEIGHT: 20%]

a **Temperature and Humidity of the Work Environment**
- i Standards for Temperature
- ii Standards for humidity
- iii How to record
- iv Frequency to record
- v What to do if not within the parameters

b **Preparing Work Area for Packaging**
- i Supplies needed
- ii Dress code
- iii Work area requirements (e.g. cleaning requirements)
- iv Location of IFUs

c **Receiving Items for Preparation**
- i Item identification (e.g. visual, computerized)
- ii How to unload equipment
- iii How to check for cleanliness
- iv How to sort items (e.g. service, facility, loaner)
- v How to accept items through pass-through window

d **Inspecting Items for Cleanliness and Functionality**
- i How to check for cleanliness and functionality
- ii How to follow the IFU
- iii Proper testing tools and process for checking functionality of items (e.g. sharpness testing)
- iv How to assemble, test, and disassemble items according to IFUs
- v How to remove and replace unacceptable items
- vi How to lubricate items according to IFUs

e **Selecting Items for Assembly**
- i How to obtain the appropriate count sheets, peel pack list, tray list (e.g. where to place count sheets)
- ii How to read and identify items (e.g. books, product number, computers, tape, etching)
- iii How to cross-reference different instruments
- iv How to size and measure items
- v Visual identification & proper names of common instru ments

f **Assembling Items for Packaging**
- i Proper handling procedures
- ii Instrument protection devices (e.g. tip protectors, foam, mats)
- iii Tray liners
- iv Proper instrument placement (e.g. facilitate sterilization, protect instruments)
- v Instrument organizers
- vi Classes and appropriate use of chemical indicators (e.g. proper placement, intended cycle)
- vii Weight limits and weight distribution

g **Packaging Method**
- i How to select appropriate packaging method (e.g. size, packaging weight)
- ii Packaging Method (e.g. flat wrap, peel pack, container)
- iii Sterilization method/cycle to be used
- iv External indicators
- v Tamper evident seals
- vi Proper application method of packaging
- vii Proper wrapping technique

h **Labeling Method**
- i Importance of legible handwriting
- ii Approved writing instrument
- iii Placement of labeling and writing (e.g. write on plastic side of peel pouch, write on tapenot wrapper)
- iv How to identify trays missing items
- v Correct tray information
- vi Technician identification
- vii Storage destination
- viii Special information identifiers (e.g. implant, loaners, steril ization methods/cycle)
- ix Date of sterilization/date of expiration (e.g. event-related versus time)

i **Transferring Items to Appropriate Area**
- i Location of sterilization areas (e.g. low temperature, high temperature)
- ii Location of staging area
- iii How to prioritize for rapid turn-around
- iv How to handle items without damaging (e.g. stacking, rough handling)
- v Delivery locations
- vi Air exchanges (e.g. negative pressure, positive pressure)
- vii Body mechanics
- viii Ergonomics
- ix How to track items (e.g. manual, computer)
- x Traffic flow

3 DOCUMENTATION & RECORD MAINTENANCE [PERCENTAGE WEIGHT: 10%]

a **Record Maintenance**
- i Environmental conditions for records storage
- ii Protocol of time-frame to keep records
- iii What needs to be kept
- iv Where kept (on-site, off-site)
- v How to retrieve

b **Temperature, Humidity, and Corrective Action**
- i Acceptable temperature humidity ranges for work areas
- ii Procedure for reporting deficiency

c **Quality Test Results**
- i Ultrasonic systems
- ii Water quality and temperature
- iii Bowie Dicks tests (e.g. run as first load of the day, empty load)
- iv Sterilizer leak tests (e.g. when test should be performed)
- v Biological and chemical tests (e.g. lot numbers, running con trol tests, correct placement of tests, incubation procedure, how to interpret results, recall process in case of undesirable outcomes)
- vi How to interpret the results of the test
- vii Take corrective action if test fails
- viii Washer decontamination process (e.g. frequency, type)
- ix Cart washer

d **High Level Disinfection (HLD) Process**
- i Safety measures when using HLD
- ii Proper disposal methods
- iii Dilution labeling requirements (e.g. concentration, expira tion, end of use date)
- iv Technician information
- v Patient information

e **Employee Incident Reports**
- i Hospital reporting policy
- ii Exposure control plan
- iii State and federal safety regulations
- iv Risk management and safety management policies
- v Patient tracing procedure (e.g. in event of needle stick, cut)

4 STERILIZATION PROCESS [PERCENTAGE WEIGHT: 20%]

a **Temperature and Humidity of the Work Environment**
- i Standards for temperature
- ii Standards for humidity
- iii How to record
- iv Frequency to record
- v What to do if not within the parameters

b **Preparing Work Area for Sterilization**
- i Supplies needed (e.g. printer supplies, test packs, label gun supplies)
- ii Perform sterilizer component checks according to manufacturer's IFU
- iii Perform cleaning according to manufacturer's IFU

c **Sterilizer Tests**
- i Leak tests
- ii Bowie Dick/air removal test according to standard
- iii Placement of biological test packs for sterilization
- iv When to perform test (e.g. repair, construction, malfunction, routine)

d **Receiving Items for Sterilization**
- i How to move items from cart to cart
- ii Proper body mechanics
- iii Proper handling of item to preserve packaging integrity
- iv How to access IFUs

e **Sterilization Method and Cycle**
- i Functionality of sterilizer
- ii How to select and change the cycle
- iii How to identify appropriate use of external indicators (e.g. sterilization method, placement)
- iv Sterilization method of items
- v Identification of appropriate packaging for the sterilization method

f **Pre-Sterilization Package Integrity**
- i What comprises integrity (e.g. holes, filters, broken locks and seals)
- ii Filter placement, locks, seals, and external indicators

g **Loading Sterilizer**
- i Metal mass versus load configuration
- ii Wrapped versus rigid containers and peel pouch
- iii Biological tests
- iv Appropriate placement of items

h **Operating and Monitoring Sterilization Equipment**
- i How to replace and dispose of empty cartridges/tanks/cassettes
- ii How to select cycle
- iii Where to place biological or air removal tests
- iv Temperature requirements for each sterilization method
- v How to access IFUs

i **Cycle Parameters**
- i How to interpret printout (e.g. temperature, time, and pressure exposure)
- ii Sign-off procedures to ensure accountability

j **Unloading Sterilizer**
- i What maintains sterility (e.g. Cooling time, temperature, handling)
- ii Body mechanics
- iii Ergonomics
- iv Traffic flow
- v Proper PPE

k **Post-Sterilization Package Integrity**
- i What compromises integrity (e.g. holes, filters, broken locks and seals, moisture)
- ii Filter placement, locks, seals, and external indicators

l **Test Results**
- i Proper handling and incubation of the biological test
- ii How to interpret test results

m **Potential Process Failures**
- i How to identify a process failure (e.g. wet packs, color change, failure to meet sterilization parameters)
- ii Procedure for follow-up after process failure

n **Lot Control Number**
- i How to produce a lot control number
- ii Where to apply lot control number according to manufacturer's IFU

o **Documenting Sterilization Load Contents**
- i How to identify load contents
- ii How and where to record (e.g. computer, manual)

p **Transferring Sterilized Items to Storage and Distribution**
- i Location of storage areas
- ii Location of staging area
- iii How to prioritize for rapid turn-around
- iv How to handle items without damaging (e.g. stacking, rough handling)
- v Air exchanges (e.g. negative pressure, positive pressure)
- vi Body mechanics
- vii Ergonomics
- viii How to track items (e.g. manual, computer)
- ix Traffic flow
- x Early release of implantable devices

5 CUSTOMER RELATIONS [PERCENTAGE WEIGHT: 10%]

a **Customer Requests**
- i Phone Etiquette
- ii Active listening (e.g. technique of repeating back to customer "I heard you say")

b **Communication**
- i Decision-making skills
- ii Communication method (email, face-to-face, phone)
- iii Medical terminology (e.g. anatomy and physiology, surgical terminology, instrumentation)

c **Internal and External Teams**
- i Troubleshooting task forces
- ii Types of teams (e.g. quality, cross disciplinary)
- iii Engagement level (e.g. attendance, follow-through)
- iv Completion of assignments
- v Role on the team (e.g. leader, observer)

d **Facility and Procedures**
- i Where to find policies and procedures
- ii How to interpret policies and procedures
- iii Frequency of review
- iv Responsibility related to review (e.g. make suggestions, keep current with them)

6 STERILE STORAGE & INVENTORY MANAGEMENT [PERCENTAGE WEIGHT: 10%]

a **Temperature and Humidity of the Work Environment**
- i Standards for temperature
- ii Standards for humidity
- iii How to record
- iv Frequency to record
- v What to do if not within the parameters

b **Preparing Work Area for Sterile Storage**
- i Supplies needed
- ii Dress code
- iii Work area requirements (e.g. cleaning requirements)
- iv Location of IFUs

c **Ordering Inventory**
- i The ordering process (e.g. par levels, computerized, manual)
- ii How to identify the product (e.g., catalog numbers, item number, descriptions)
- iii Unit of measure (e.g. each, box, package, case)
- iv How to handle back-orders

d **Receiving and Inspecting Inventory**
- i What compromises integrity (e.g. holes, filters, broken locks and seals, water damage, dust)
- ii External indicators and expiration dates
- iii How to match delivery document to what was received (e.g. signing for deliveries)

e **Stocking and Rotating Inventory**
- i Location of supplies
- ii Shelf life policy (e.g. First In First Out (FIFO), expiration, event-related)
- iii Process for rotating inventory
- iv Proper storage requirements
- v Proper break-out area (e.g. corrugated cardboard, external shipping containers)

f **Distributing Sterile and Non-Sterile Items**
- i Distribution methods
- ii Proper handling of items
- iii Ergonomics
- iv Body mechanics
- v Transport guidelines (e.g. closed cart, bins, dustcovers)

g **Monitoring Item Usage**
- i What system to use (e.g. manual, computerized)
- ii Identification of items

h **Tracking Items Distributed by CSSD**
- i High dollar items
- ii Specialty carts
- iii Critical items
- iv Vendor-owned items
- v How items are tracked (e.g. manual, RFID, computerized)
- vi When to review MSDS information and how to access and interpret MSDS information

i **Disposing Inventory**
- i How to handle recalled items
- ii Open/not used single use item
- iii Damaged items
- iv Expired items
- v Obsolete items
- vi Recycled items
- vii Donations of items to others

7 PATIENT CARE EQUIPMENT [PERCENTAGE WEIGHT: 10%]

a **Temperature and Humidity of the Work Environment**
- i Standards for temperature
- ii Standards for humidity
- iii How to record
- iv Frequency to record
- v What to do if not within the parameters

b **Preparing Work Area for Distribution**
- i Supplies needed
- ii Dress code
- iii Location of IFUs

c **Receiving Items for Preparation**
- i Process for recording and tracking rental equipment
- ii Item identification (e.g. visual, computerized)
- iii How to unload equipment
- iv How to sort items (e.g. type of equipment)

d **Inspecting Equipment for Cleanliness and Functionality**
- i How to check for cleanliness
- ii How to check for compliance with safety standards (e.g. frayed cords, preventative maintenance date, damage)

e **Assembling Equipment for Distribution**
- i How to assemble equipment for distribution
- ii How to test equipment per manufacturer's use policy
- iii How to package equipment
- iv How to label equipment
- v How to access IFUs
- vi How to access disposable components

f **Care and Handling**
- i What equipment requires charging or battery replacement
- ii Location and proper storage of equipment
- iii Environmental requirements for stored equipment (e.g. dry, clean)
- iv Preventative maintenance dates

g **Distributing Equipment**
- i Process for recording
- ii Types of equipment maintained in CSSD
- iii Delivery protocols
- iv Delivery locations (e.g. OR, ED, Labor and Delivery)

h **Tracking Medical Equipment**
- i Systems used (e.g. manual, computer, RFID, hybrid)
- ii How to record and track the distribution

i **Repair and Safety Inspection**
- i Process for completing biomedical work order (e.g. manual, computerized)
- ii How to identify label for safety inspection/preventative maintenance