HCL Technologies Industrial Training

BPM Training Examination Group Team Exam- Due Date 15 January 2018

IBM BPM Group Work -BPM 8002 Kennedy Chengeta,BPM SME, Phd Candidate

Reading Time: 4 days

Writing Time: 96 Hours

Permitted Materials: Notes and any other material

Answer all questions in this section using the answer booklet(s) provided. Answers are expected to be succinct but complete. Answers that are too long and irrelevant will be penalized. Please do the technical work in IBM BPM Cloud and also take screenshots in a word document. Groups of 2 or 3, will be done and submission will come in as one's group for this.

Question 1 Please define the following methods of a REST Service namely and give example of a BPM API on REST that achieves the following below. eg the getTaskDetails on TASK API uses the a GET operations

- 1. GET
- 2. POST
- 3. PUT

Question 2a Please give a brief understanding of Ad-hoc Process? [5 marks] Diffentiate an adhoc process and a straight through process giving advantages and disadvantages of each? [5 marks]

 ${\bf Question~2b} \quad {\bf Explain~the~uses~of~a~Saved~Search?[~5~marks]}$

 ${\bf Question~2c} \quad {\bf Which~BPM~database~does~a~Saved~Search~get~its~data~from?[~5~marks]}$

Question 3 BPM uses Single Cluster and Multiple Clusters? Explain why and give examples of a single cluster architecture and multiple cluster in BPM. Draw diagrams if necessary.

Question 4

1.	[5 marks]	BPM	runs the	e BPM	engine	on a	basic	java	Engine	please	${\rm explain}$	the
	matching ja	ava eng	gines for	these I	BPM pr	oduct	\sim ?					

- (a) IBM BPM –;
- (b) Oracle Fusion $-\xi$
- (c) Pega —;
- 2. [5 marks] Pega can run on different platforms, explain why that is an advantage/disadvantage over IBM BPM?

Question 5a Please show how to use SoapUI to call the OpenWeatherService API get Weather of a specified town in the world. Show screenshots in a word document for the request and response. Please a generate a token and use it in this case. [10 marks]

Question 5b What is the role of a Websphere Administrator in IBM BPM? [5 marks]

What is the role of a IBM BPM Administrator in IBM BPM? Which tools does one use [$5~{\rm marks}]$ **Question 5d** BPM REST response codes include the following HTTP codes 401, 404, 403,500 and 200 for successful responses. Please run tests to demonstrate cases where you can get any 3 of the above using any of following APIs on REST.Please show screenshots.

- 1. [5 marks] Process API-startProcess
- 2. [5 marks] Task API –getTaskDetails
- 3. [5 marks] Task API –finishTask

Question 6 Please define a 2 step process in IBM BPM Cloud and inside the Exam Process Application and show the model here. Call the process CarLoanApplicationProcess-YourName. The process should show a car loan application and the first step should be called "Capture Car Application" and the second "Approve Car Loan". Please create a process BO and call it CarLoanApplicationProcessBO with variables following the following outlined sub Business Objects.

- 1. [5 marks] customerDetailsBO with name, surname, dob, addressBO, emailAddress, phoneNumber, nextOfKin, suretyPersonName, town
- $2.\ [5\ marks\,]\ car Loan Application Details\ with\ loan Date, loan Approval Date, loan Amount,\\ car Details BO,\ car Loan Status, interest Rate, repayment Amount\\ , approver, capturer Consultant Name$
- 3. [5 marks] customerFinancialDetailsBO—customerSalary, customerEmployer, customerNetSalary,customerExpenses,customerCreditScore.

Question 7 Based on the process in 6 above please do the following [[20 marks]

- 1. [5 marks] Generate Human Services applicable per step and call the first one captureLoanHS and the second one approveCarLoanHS
- 2. [5 marks] Please make town, status fields as drop downs taking the following values respectively for Town Pretoria, Durban, Cape Town, Tzaneen, Messina, New Castle
- 3. [5 marks] Please make status take values, "Pending", "Approved", "Rejected", "Cancelled" in a drop down.
- 4. [5 marks] ApplicationDate should not be on the coach but should be autocalculated when the process starts.
- 5. [5 marks] The approverCarLoanHS should have a header of customerDetails and thee application Details and Financial Details should be in a tab.
- 6. [5 marks] The approver should only change the status only to approved or rejected. If rejected is selected, the approver should see a field called comments to put reason for rejection. IF approval is approved, the field should not show.

Question 8 Validations These will be based on the process in Question 6 above.

- 1. [5 marks] On the approve CarLoanHS please make comments mandatory only when approval status is rejected
- 2. [5 marks] On the captureCarLoanHS please make all personal details, financial details manadatory and show a message if this is not submitted this is mandatory.

Question 9 Adhoc Process

ABC Rugby Team wanted to do a arrange an end of year party to celebrate winning Rugby league. So they looking for a BPM process that will allow him to do the following

1. Book a venue for the party. This is done by Rugby Party Committe.

- 2. Make a payment of the venue. This is done by Rugby Finance Committee
- 3. Hire a Venue Decorator for the party only when the venue has been booked successfully. This is done by the Rugby party committe.
- 4. A chef make food arrangements for the party only when the number of delegates has been confirm. This is done by the Rugby Food Committee.
- 5. Transport Secretary does transport arrangements to venue when venue has been booked. This is done by the Rugby Party Committee.
- 6. Rugby Party Committee invites and confirms delegates. When venue has been booked.
- 7. Party will kick off if all the above are done except payment which can be paid before or after the party and takes 5 hours.
- 8. Cleanup of the venue will be done by KC Cleaners after the party.

Please create the following

- 1. [10 marks] Please define and AdHoc process with AdHoc Tasks with preconditions for the above and the following steps, Book Venue, Pay Venue, Decorate Venue, Prepare Food, Make Transport Arrangements. Please create a snapshot.
- 2. [10 marks] Please run a test of the above by triggering from REST API Start Process API
- 3. [10 marks] Please Trigger 10 processes
- 4. [10 marks] Please create a Saved Search in Portal and Search it on REST API, Task API, Task Querry Entity List. Dont forget to put size and offset to maximum 10. Please put the following on the Saved Search namely, name, surname, application date, approval Date,
- 5. [10 marks] Please create a Team for the above teams namely Rugby Party Committee, Rugby Food Comittee, Rugby Finance Comittee and assign to the tasks defined.

Question 10 ServiceFlow to consume getWeatherAPI service—getWeatherAPIServiceFlow

- 1. [10 marks] Please create a YAML for the OpenWeatherService API REST Service. The YAML will provided for those who just want to the second question.
- 2. [10 marks] Please create a ServiceFlow that consumes the service above in BPM and run some test to get the data. Please test the ServiceFlow using the REST API-Service API, startService. Remember to generate the input data JSON that matches the input BO for the Service Flow.
- 3. [10 marks] Pleasee test the serviceFlow from REST API and capture screenshots

Question 11 .. BPM and ECM Documents

Please define process app called **Demo-DocumentUpload-YourName**.

- 1. [5 marks] Create a 2 step process
- 2. [5 marks] Call the first step upload document.Create a Human Service called Upload Document HS
- 3. [6 marks] Call the second step called View Document Human Task and create a Human Service called View Document HS
- 4. [6 marks] Implement a Coach using a header and footer coach views to upload a document
- 5. [6 marks] Implement a Coach using a header and footer coach views to view a document you just uploaded
- 6. [6 marks] Explain the concept called CMIS

——— End of Examination ———