

Enhanced Technique For Placement Monitoring using Servicenow Portal



Cmak Zeelan Basha, Sofia Tasneem, Preethi Miriyala, Syed Saleem Basha

Abstract: Placement Monitoring System is a part University placement cell which plays a crucial role in providing job opportunities to the under graduated and post graduates passing out from the college by having collaboration with many reputed industries and firms. The opportunities for the students being ready to be placed are increasing continuously. There is a lot to monitor for the placement cell authorities where they need to manage the student profile and documents related for their training and placement. They also need to collect the information about various companies that are ready to recruit students and notify the students time to time about them.[1] The background work that the placement cell needs to monitor is more. They need to maintain various platforms, large data and also they need to modify and update the data who are yet too placed and who are to be placed. And for this the updating and modification need to be done manually which is a time taking process. This project facilitates the placement monitoring system to communicate with the students and give a clear list of students who are placed and who are not. And the students who are not placed can only receive about the campus recruitment drives and the students who are placed need not receive these notifications. ServiceNow is one such platform which provides a single system/platform where every detail of the student can be monitored and send the notification emails to the students who are to be placed making the management cell their work easier. The total data can be monitored with the artifacts present in the ServiceNow itself, which includes client scripts, UI policies, notifications, workflows and service portal.

Keywords: UI policies, Roles, Access controls, Notifications, workflow and service portal.

I. INTRODUCTION

Before working with the ServiceNow platform you need to know 'What is ServiceNow?' – ServiceNow is a cloud based IT service management tool which provides a single platform to maintain all the records for IT services,

Revised Manuscript Received on November 30, 2019.

* Correspondence Author

CMAK Zeelan Basha*, Department of CSE, Koneru Lakshmaiah Education Foundation, Vaddeswaram, Guntur, India. Email: cmak.zeelan@gmail.com

Sofi Tasneem, Department of CSE, Koneru Lakshmaiah Education Foundation, Vaddeswaram, Guntur, India. Email: sofiatasneem1998@gmail.com

Preethi Miriyala, Department of Computer Science and Engineering, Lakireddy Bali Reddy College of Engineering,,Mylavaram, AP, India. Email: preethimiriyala2411@gmail.com

Syed Saleem Basha, Department of CSE, Koneru Lakshmaiah Education Foundation, Vaddeshwaram, Guntur, India. Email: saleemsd345@gmail.com

© The Authors. Published by Blue Eyes Intelligence Engineering and Sciences Publication (BEIESP). This is an open access article under the CC-BY-NC-ND license http://creativecommons.org/licenses/by-nc-nd/4.0/

operations, business management by automating IT service applications and processes. All the aspects you need for the usage can live in ServiceNow platform itself. The artifacts used for making this process successful are the Form Designer, Client scripts, UI policies, Roles, Workflows and Service portal.

A. Form Designer

This artifact of ServiceNow is used for designing forms and form fields where form layout can be created. In simple words it is a drag and drop interface which helps an user for creating form layouts, adding fields to the tables created, create and delete from sections, and creating form views.

B. Client Scripts

Scripting is one of the features in ServiceNow which helps in providing features like-validations of data, notifying the users with alerts, confirmations or any messages, and interaction with the third party web services. Client-side scripting is one of the scripting types in ServiceNow which can do: placing the cursor on any one of the required field when a form loads or to generate alert messages writing a simple line Tof java script code, highlighting a form field, validating the data, hide/show fields or sections

C. UI polices

[2]UI policies are other type of client side scripting's which are unlike client scripts and do not need any scripting for them to execute. They can govern form and form-fields behaviours. They can make any form field mandatory, read-only, or visible.

D. Roles and Access Controls

We assign roles to each section of the form because the form cannot be granted access to everyone, which can make many changes to the database. We use roles for restricting access to the users so that only their required part or section of the form can be modified by the particular assigned user. Access controls are also one such security providers which help in securing the applications and modules.[3] They provide four kinds of access permissions- read, write, delete, create.

E. Workflows

Like we need a process flow scheduled for everything to happen in a prescribed manner, workflow in ServiceNow is used for automating activities in applications.[4] Activities of workflows include user approvals, notifications, testing and conditions. Workflows start with a begin activity and end with an end activity. Workflows do not execute unless they are published.



Enhanced Technique For Placement Monitoring using Servicenow Portal

F. Service portal

This is user interface which is built using the Service portal framework which allows access to any type of platform components including – user profiles, approvals, metrics, service catalog, surveys and many more.

II. OVERVIEW

Placement Monitoring Units in most of the universities strive harder to make each student successful by developing his skills and activities. They start working and collaborating with many firms and industries. They operate round the year to propagate contacts between the students and firms. On the invitation of the placement cell authorities many reputed industries start visiting the institute to conduct interviews.

They need to collect the student data and documents of their perspective training and placements manually. They need to store them in the huge databases so that the data cannot be changed by any intruder. They also need to provide security so that the data is not reached in the hands of any unknown which brings down the fame of the institution.

This unit also need to modification and updating from time to time because the students who are getting placed in a company need not further receive any type of email notifications about the other companies visiting the campus. For this they need to update and check manually and keep modifying manually every time when a company visits the campus. Excel sheets storing all the information about the students needs to be floated among the students through emails to check whether he is eligible or not. [5]Once a student is placed is placed in a certain company then the student is not eligible for the future drives unless the CTC offered by the other company is greater than one lakh to the salary he is currently assigned, this is the normal strategy that most of the universities follow. For this the placement cell should keep updating the list of students.

The main objectives of this project are:

- Making work environment of the placement cell easier.
- Keep updating the students through emails using only one application ServiceNow.
- Transferring only the required information to the student.
- Reducing the work load of many people which could be handled by only a few authorities.

III. EXISTING SYSTEM

This system describes the features of the currently working model and the main drawbacks. Placement monitoring cell in almost most of the reputed universities they strive harder in making almost every student placed in a company. For this they need to maintain data of each individual student so that they can float that data to the firms that are ready to recruit from their universities/colleges.

So they see that the data is secure. The main drawback of this system is that the data need to be updated or modified manually by the placement head or in charge. The procedure that the universities follow is when a student gets placed in a certain company (say A) then the student will not be allowed for the future placement drives unless the salary provided by the other company (say B) is greater than one lakh to the salary that is provided by company A.

So the placement cell need to see that the student stop receiving notification emails about future placement drives as he is already placed. And the student who is not yet placed should continue in receiving the emails until he is placed in the certain company. The placement cell need to maintain the data in large excel sheets which need to be modified and updated regularly. If not protected properly the data can go into the hands of any intruder.

This also takes more man power, large volume of files for every individual company, space complexities and time consuming. The main drawback about this system is sending the emails to students for every placement drive's information. The students who are placed have no use in receiving the emails about the future companies that are going to visit the campus. So, most of the students become stressed out in receiving the notifications continuously. The placement incharges have no information about this and they try sending the emails to each and every student.

IV. PROPOSED SYSTEM

[9]Placement monitoring system is the main backbone of many universities. Students themselves cannot reach out to the firms for getting placed in there. So this cell acts as a communication link between the students and the companies. The placement cell should be more effective so that there should not be any type of disputes arising. They strive so hard so that the student finds the right job and the company finds the right employee.

ServiceNow provides a single platform to main, update, modify, notify about each single information through a single portal i.e., ServiceNow itself. The artifacts used in development of this project are client sctipts, UI policies, Roles, Access controls, Workflows, Service portals.In Servicenow flow Designer is a an added artifact which works same as Workflow.This also helps in building the application and also automate.

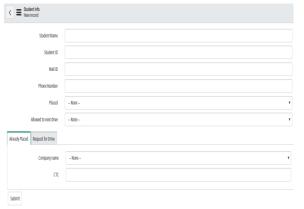
The proposed system working starts with designing a form where the sections of forms have access to students and placement authorities. The service portal is a platform in ServiceNow where the student or placement authorities can login to this form section with their credentials.



Published By: Blue Eyes Intelligence Engineering & Sciences Publication

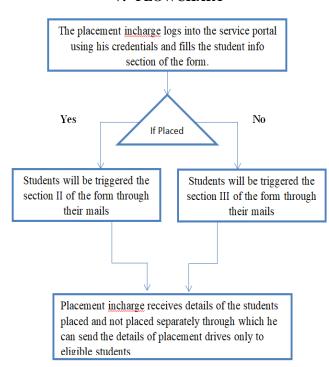


The form consists of student info section and the other two sections include – already placed which is for the students who are already placed in a certain company, the third section of the form- request for the drive section which is to be filled by the students who are yet to be placed/ not eligible for the drive.



The above are the three sections of the forms which are not accessible to all the people but only accessible to the people for whom the roles are assigned using roles artifacts in ServiceNow.

V. FLOWCHART



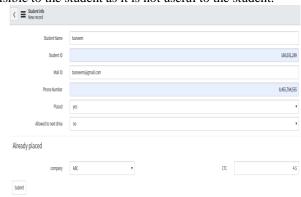
VI. RESULTS

[1]The procedure starts by designing the form with the above three sections where section I i.e., the student info form is only accessible by the placement incharge and section II of the form is accessible by the student who are already placed as they need to give the information about the company they are laced and the CTC the company is offering them, section III of the form is accessible by the student who are not eligible/yet to be placed students as they need to provide the information for their non-eligibility, they need to take the level of request from the higher officials which includes Head of the Department, Placement Dean and other.

[2]When the placement incharge marks the student as placed then the student placed will receive an email notification through email where only section II of the form will be visible to the student, and when the incharge has marked him not placed then the section III of the form will be sent to the email of that particular student. The student can neither edit nor change any of his detail because the access in modifying the section I form is given only to placement incharge[8]. This total access restriction is done through roles and hiding the visibility of the section to section is done through client scripts by writing a single line of script.

There are two possibilities for the student:

[6][7]If a student is placed in a certain company then the placement incharge will mark the student as placed and he will be floated a section of the form where his details are already filled by the placement incharge and he just need to enter the company name he is placed and CTC(cost to company). For this the section III of the form will not be visible to the student as it is not useful to the student.



The III section of the form is not visible to the student as the placement incharge has marked him as placed so the III section becomes invisible. Client scripts serve an easy purpose in hiding the sections of the form.

- 1. If the student is not placed then there should be reason for the non-eligibility and section II of the form will not be necessary to the student. When the placement incharge will mark him as not placed then the reason for his non-eligibility will be filled by the student and the company he is not eligible will also be filled.
- [3] All the sections of the in according to the roles assigned will be shown to the students. From this we can make a clear files of students placed and not placed and can repeat the process till all the students get placed.

Student info New record				
Student Name	tasneem			
Student ID				160,031
MailID	tasneem@gmail.com			
Phone Number				9,658,473
Placed	по			
Allowed to next drive	no			
Request for Drive				
Select Drive	ABC	•	Level of Request	H00
Reason for non-eligibility	not met eligible criteria	Y	Short description	XXXX-XX



Enhanced Technique For Placement Monitoring using Servicenow Portal

- 2. When all the student complete their respective filling of the form then the students list can be separated in according to the students who are placed and who are not.
- 3. The list separated for the non-placed students can now receive the information about the future drives that are yet to come to the campus.
- 4. [4] Workflow helps in automating these approvals and notifications where it receives data from the incharge processes the data along with the required form of the section and then emails it to the student. Then the total data required will be present in the list view of the ServiceNow interface. Thus workflow helps in notifications.

VII. CONCLUSION

This project solves all the problems by an easy approach through ServiceNow where it is a user friendly environment. [5]Based on the results gathered we can state that this approach can now be useful in many universitities playing a vital role in solving all the problems evolved by the existing approach. Security issues can be overcome through use of roles and without using any of the outside applications we can conclude using a single platform. All the students receiving emails can submit their response through forms itself and that data can be collected in ServiceNow list view.

REFERENCES

- Vinay Parameshwarappa, Nandish S (2014) "A Segmented Morphological Approach to Detect Tumour in Brain Images" International Journal of Advanced Research in Computer Science and Software Engineering.vol 4.
- Jay Patel and Kaushal Doshi. Advance in Electronic and Electric Engineering. ISSN 2231-1297, Volume 4, Number 3 (2014), "A Study of Segmentation Methods for Detection of Tumor in Brain MRI".
- Vishal B. Padole, D. S. Chaudhari, International Journal of Electronics, Communication & Soft Computing Science and Engineering (IJECSCSE) Volume 1, "A Review of Segmentation Methods for Detection of Brain Tumor in MRI".
- Sudipta Roy, Sanjay Nag, Indra Kanta Maitra, International Journal of Electronics, Communication & Soft Computing Science and Engineering (IJECSCSE) Volume 3, Issue 6.
- Rohan Kandwal, Ashok Kumar(2014) "An Automated System for Brain Tumor Detection and Segmentation"
- Jobin Christ M.C. 1, Dr. Parvathi R.M.S. IJCSI International Journal of Computer Science Issues, Vol. 9, Issue 4, No 3, July 2012"Brain Tumors: An Engineering Perspective".
- C M A K. Zeelan Basha, Maruthi Padmaja, and G.N.Balaji, "Computer Aided Fracture Detection System" Journal of Medical Imaging and Health Informatics Vol. 8, 526–531, 2018.
- Azmira Krishna, CMAK Zeelan Basha, Pradeep Raj Savarapu, Soumya Ranjan Nayak, S. Sivakumar "Multi Target Tracking Access with Data Association in Distributed Camera Networks", International Journal of Recent Technology and Engineering (IJRTE),vol.8,412-417.
- Cmak Zeelan basha, Azmira Krishna, Pradeep Raj Savarapu "Automatic Detection of Lung Infection", International Journal of Recent Technology and Engineering (IJRTE), Volume-8,200-203.

AUTHORS PROFILE



Mr.Cmak Zeelan Basha is working as Assistant Professor in department of CSE in Koneru Lakshmaiah University. His research area is Image processing. He has published several papers in area of image processing. He is having around 10 years of experience in teaching Area of interest in subjects are Image

processing, Data mining and Data Warehousing, Data Structures, python programming, OOPS through Java etc.



Sofia Tasneem is pursuing her Btech in Koneru Lakshmaiah University in CSE department. She is an Expert in ServiceNow platform. She is fond of research and areas interested are Cloud Computing, Image Processing. She is an Expert in Programming languages like C,python,OOPS.



Preethi Miriyala is pursuing her Btech in Lakkireddy Bali Reddy in CSE department. She is fond of research and areas interested are Cloud Computing,Image Processing. She is an Expert in Programming languages like C,python,OOPS.



Fourth Author Syed Saleem Basha is pursuing his Btech in Koneru Lakshmaiah University in CSE department. He is fond of research and areas interested are Networking and Data Analytics. He is Expert in languages like C,Python,OOPS.

