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Forms Automation

By Benny Lam & Fong Xue Ying, NIE ACIS

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Agenda

- Enterprise Forms automation
- Student Services Forms
- Phased approach
- Choice of Technology
- Area of Improvement
- Planning Process
- Improvement
- The Transformation
- Q & A

Enterprise Forms Automation

- Computer system to manage, distribute, complete and process paper based forms

- Achieve paperless office
  - Boost productivity
  - Save resources
  - Save space
  - Information sharing easier
  - Information more secure
  - Protect the environment

Objective of Forms project

1. To improve student's user experience of submitting request for student administrative matters

2. 120+ student forms to automate

3. Eliminate 17,000 hardcopies per year

4. To improve back office efficiency in handling request

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Phased out approach

Phase 1 (Digitize)
- High impact forms
- Streamline of data
- Choice of software architecture

Phase 2 (Maximize)
- Rest of forms
- Outsourced

Phase 3 (Automate)
- Streamline of process
- Design of workflow engine

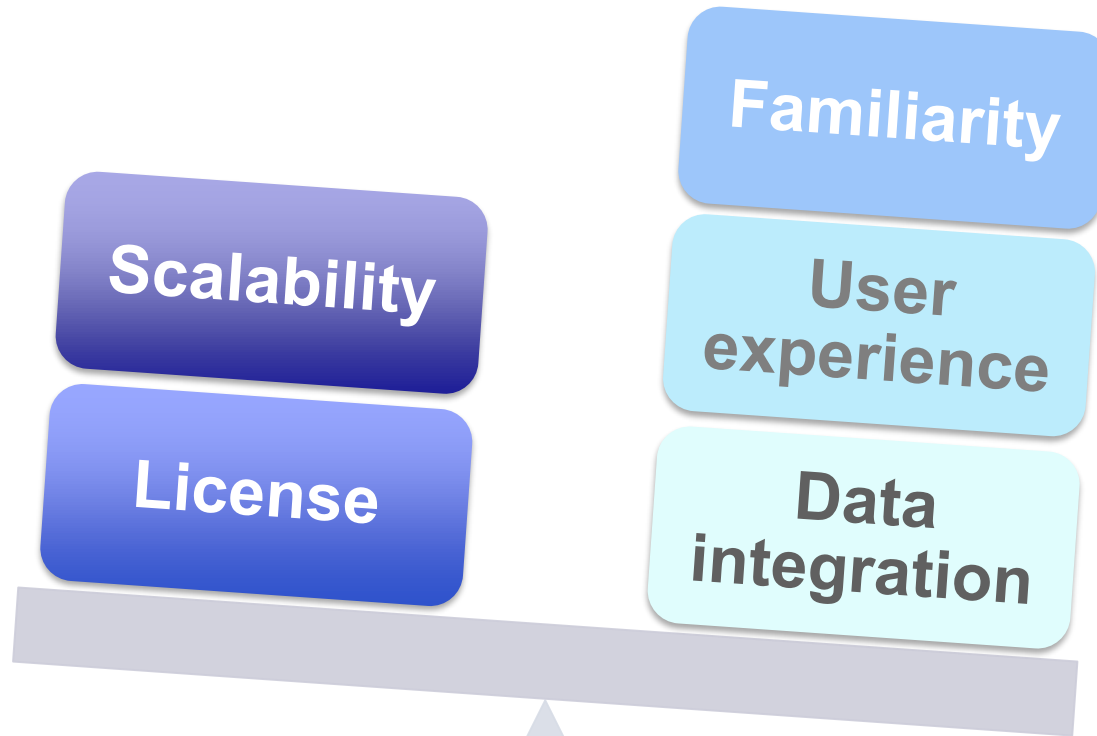Jan to April 2018 > April to Oct 2018 > Aug to Jan 2019

Choice of Technology

servicenow

COTS

Extend Student System and mobile app

Familiarity

Scalability

User experience

License

Data integration

Design points

Forms Details

- Scalable unstructured Data storage
  - JSON in clob rather than structured tables

Attachments

- Attachments to be stored as links in Oracle directory rather than blob
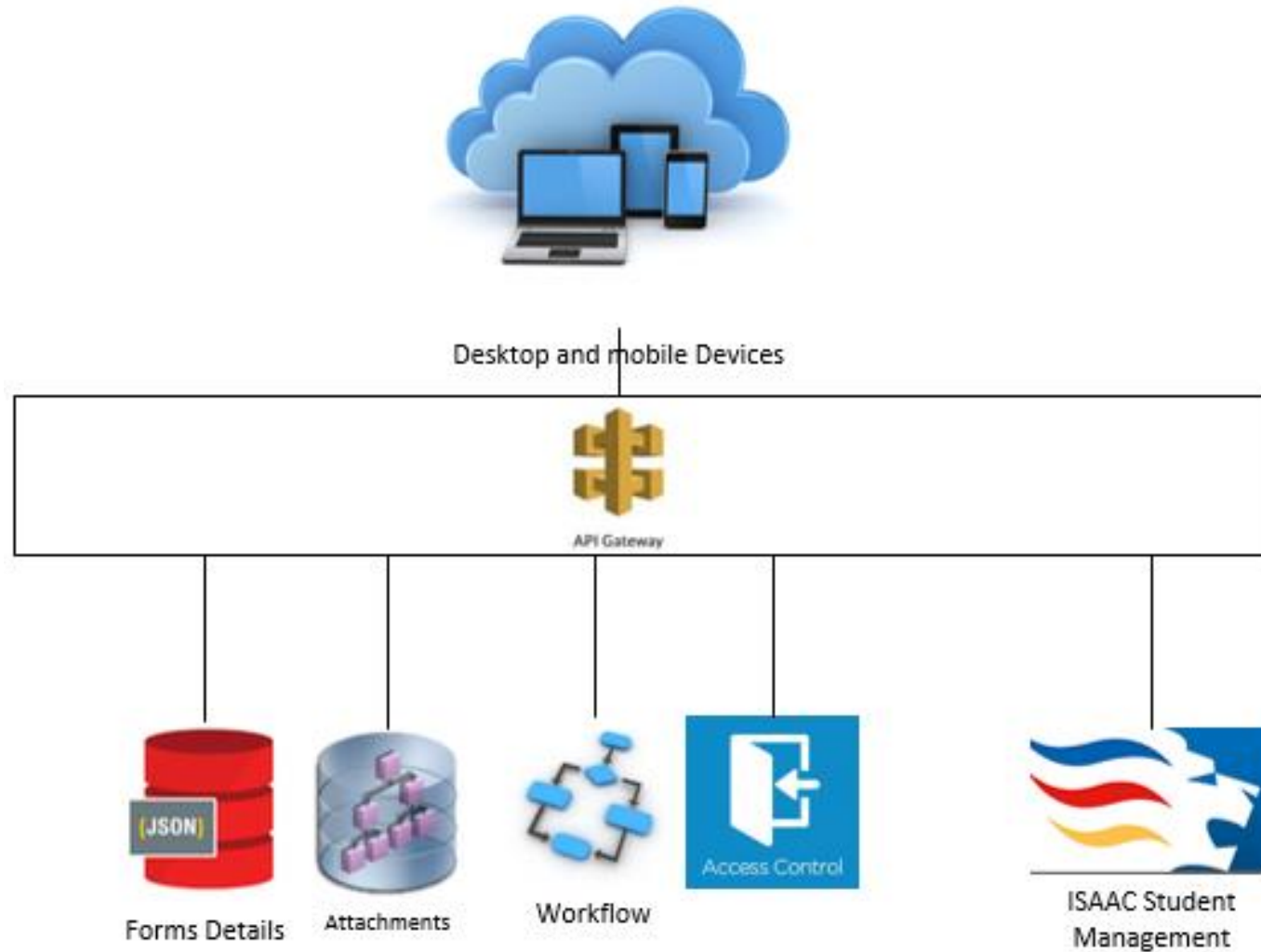
Workflow

- Workflow to be build on top of forms objects

Access Control

- Access control closely integrate with workflow engine
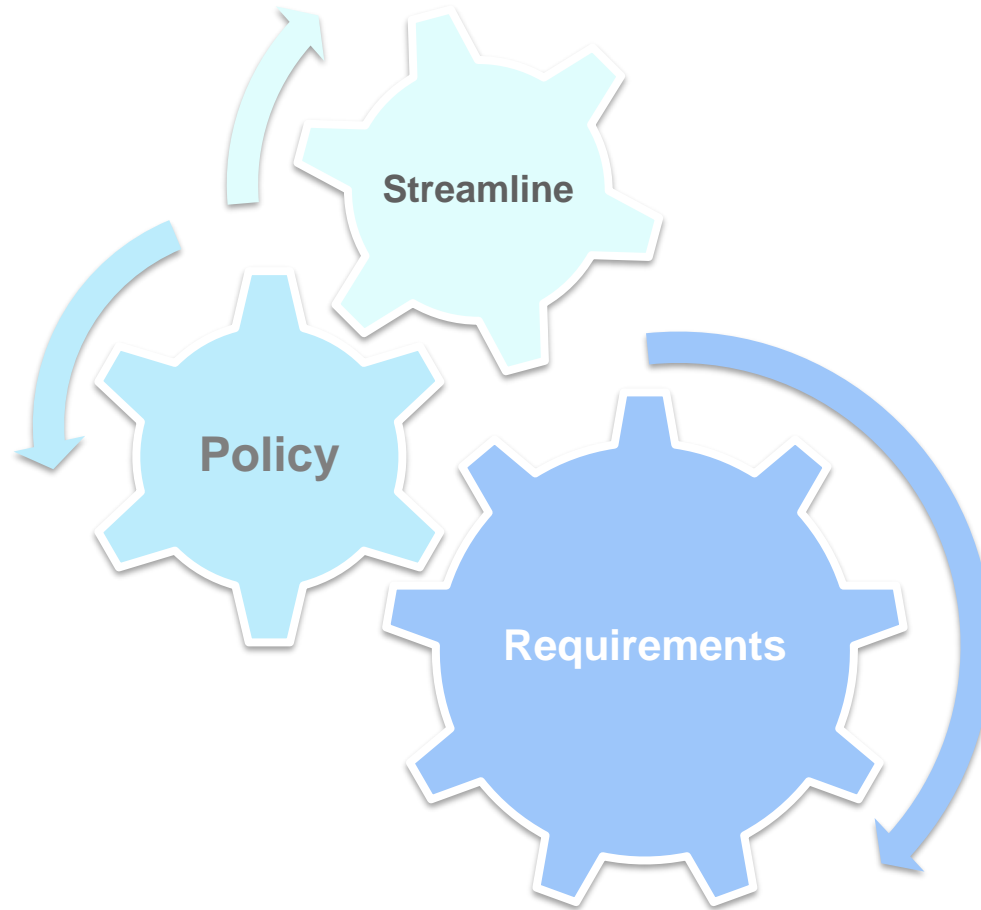
High level architecture

Desktop and mobile Devices

API Gateway

Forms Details   Attachments   Workflow   Access Control   ISAAC Student Management

Area of improvement

- Inconvenient submission process
- Confidential details that is not required

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Planning Process

Improvement

- Easy Access and submission
- Control the display of forms
- Common layout
- Minimum details
- Merging of forms
- Remove confidential details that is not required

Process Improvement

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The Transformation

Procedure to find forms

Form Categories

Integrated Student and Academic Administration System

My Bill   Student Services (HD)   Examination   Forms   Help

Home :: Forms :: Forms List

Forms List

Collapse All   Expand All

+ Attachment Leave

- Candidature Extension
    Application for Extension of Candidature (PDCM)
    Application for Extension of Candidature (Coursework Programmes)
    Application for Extension of Candidature (Research Programmes)

+ Conference Funding

+ Conference Leave / Allowance

+ Confirmation/Conversion of Candidature

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Layout

- 100+ different layout of student's particulars and details required

1	PERSONAL INFORMATION

<u>TO BE COMPLETED BY THE CANDIDATE</u> (After completing this portion, please submit this form to your supervisor together with your thesis)

Name of Candidate :

IC/FIN No:

Degree:

Full Time / Part Time* (please circle one)

Commencement Date of Candidature:

Academic Group/ Research Centre:

Contact No.:

Email :

Signature:

Date:

Year of Study: ⌐1ˢᵗ ⌐2ⁿᵈ ⌐3ʳᵈ ⌐4ᵗʰ   Intake: Jul / Dec * _____

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Common Layout

Integrated Student and Academic Administration System

My Bill   Student Services   Practicum   Examination   Forms   Help

APPLICATION FORM FOR INTERNATIONAL PRACTICUM & SEMESTER EXCHANGE

* denotes compulsory fields

SEMESTER EXCHANGE AND INTERNATIONAL PRACTICUM PROGRAMMES

INFORMATION FOR ALL APPLICANTS

APPLICATION DEADLINE

In addition to this completed application form, applicants must submit the following items:

- Digital copy of passport-size photo
- Scanned copy of your passport details

Submit the completed application form and all required documents to:

Deadline for receipt of all documents:

31-Jan-2019   23:55

Manager, International & School Partnerships Unit
Office of Teacher Education
National Institute of Education
1 Nanyang Walk, Singapore 637616
Fax: (65) 6790 9158
Email: sunny.sitoe@nie.edu.sg

STUDENT'S PARTICULARS

Matriculation/Registration No.:	U1234567F	Name:	John Tan
Intake:	Jul 2016 Semester	Email:	testing123@nie.edu.sg
Programme:	BA (Ed) (Primary) (AS: English Literature) (2 CS) (Upgrader)		
Mode of Study:	Full-time		

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Original form – International Practicum

10 CRIMINAL OFFENSE AND MEDICAL STATUS

Please answer the following questions:

11 DECLARATION BY APPLICANT

I hereby declare that the information provided above is accurate and complete. It is my responsibility to inform Office of Teacher Education, NIE of the updates (if any) and the misrepresentation will lead to disqualification of my application for admission in the University of my choice. In addition, I authorise my information provided will be used in the admission process and other purposes in support of my study in the University of my choice.

_____   _____
Date   **Signature of Applicant**

Original form – Semester Exchange

10 CRIMINAL OFFENSE AND MEDICAL STATUS

Please answer the following questions:

11 DECLARATION BY APPLICANT

I hereby declare that the information provided above is accurate and complete. It is my responsibility to inform Office of Teacher Education, NIE of the updates (if any) and the misrepresentation will lead to disqualification of my application for admission in the University of my choice. In addition, I authorise my information provided will be used in the admission process and other purposes in support of my study in the University of my choice.

_____
Date

_____
Signature of Applicant

Remove unnecessary confidential data

9 FAMILY BACKGROUND

11 DECLARATION BY APPLICANT

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_____   _____
Date   **Signature of Applicant**

Merge Form and Captured Essential information is captured

SECTION 8: CRIMINAL OFFENSE AND MEDICAL STATUS

DECLARATION BY APPLICANT

☐ I hereby declare that the information provided above is accurate and complete. It is my responsibility to inform Office of Teacher Education, NIE of the updates (if any) and the misrepresentation will lead to disqualification of my application for admission in the University of my choice. In addition, I authorise my information provided will be used in the admission process and other purposes in support of my study in the University of my choice.

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Maximum File size allowed to upload : **100 KB**

Document Description: `<-Select->` ▼   **+ Add files...**

Document Description	**Name**	**File Size**

Submit

For technical assistance, please contact Service Desk at 6790 3033 (office hours only) or email to servicedesk@nie.edu.sg

Mode of Study: Full-time

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