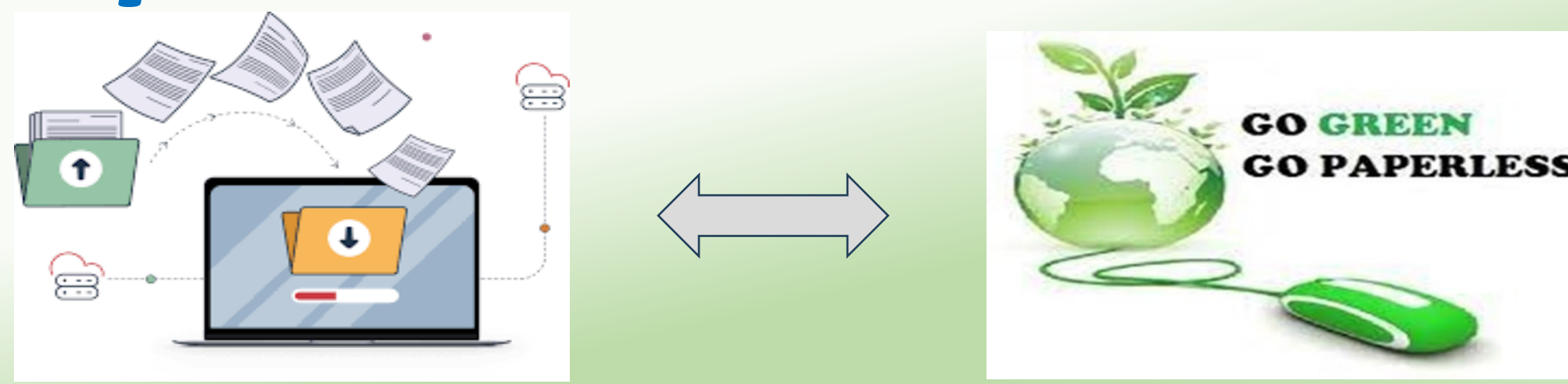# Converting Paper-Based Forms to e-Forms

GO GREEN GO PAPERLESS

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Introduction

In recent years, SCH Operations has increasingly recognized the benefits of transitioning from paper-based forms to electronic forms (eForms). This is further required with accumulation of some urgent issues faced by SCH Operations as follow:

- *Storage and Space Issues* → Physical documents require significant storage space
- *Time-Consuming Processing* → Handling, sorting, and processing physical documents has been labor-intensive and time-consuming for the team and this resulted in further delay of overall application processing workflow
- *Difficulty in Data Retrieval* → Searching for specific information in a stack of physical documents has been tedious and inefficient, leading to delays and potential errors in retrieving the application forms
- *Environmental Concerns* → Use of paper contributes to deforestation and environmental degradation, and the need for printing adds to carbon footprints and resource consumption.
- *Cost* → Increased in monthly costs associated with printing, storing. This also include expenses for paper, ink, filing cabinets, and storage facilities.
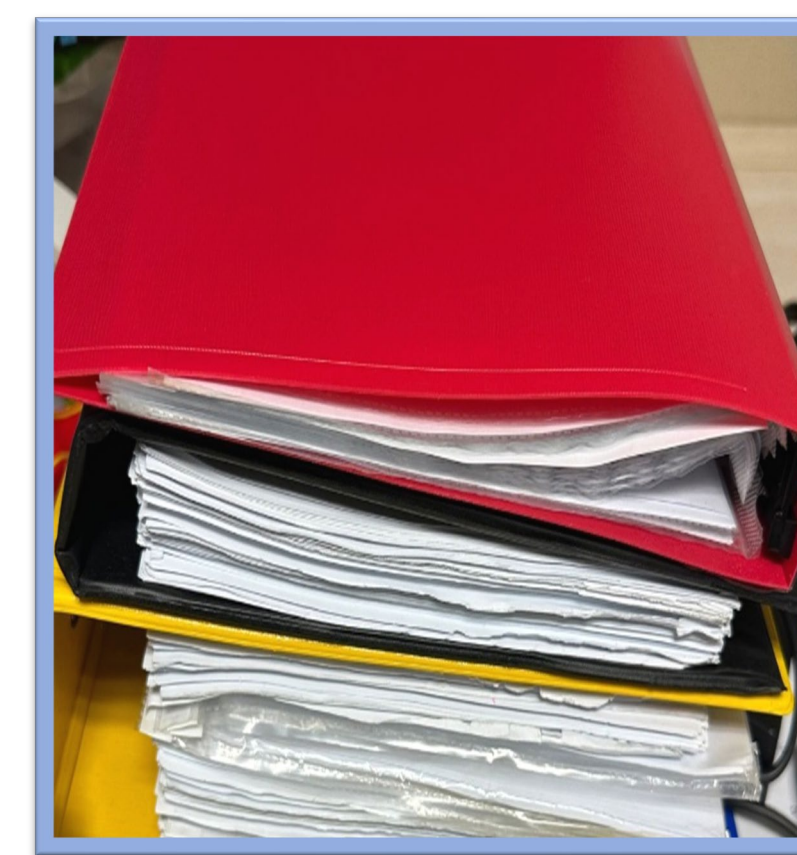
Methodology

(1) The team came together in July 23 and decided on one most appropriate manual form to be converted to e-Forms. (2) *"Request of Key Form"* was chosen as it is the highest number of application forms received by SCH Operations. (3) Process Mapping was conducted to identify wastages and areas to eliminate. (4) Numerous testing with designing and streamlining of workflows were conducted via UAT/Production – Nintex.

1. Key Request Form selected as it is most frequently

S/N	Type of Forms	Sites Involved	Departments Involved	Remarks
1	Request for Key	SCH	Ops, Synapxe, Comms	Highest number of applications received
2	Request for Mobile Phone Allowance	SCH	Ops, Synapxe, Comms, 1FSS	2nd highest number of applications received
3	Request for Carpark Benefit (Monthly)	SCH, SKH, SingHealth HQ?	Ops, SKH, SingHealth HQ	Obsolete
4	Encrypted Portable Storage Device Application / Return Form	SCH	Ops, Synapxe, Comms	Ops to share knowledge for other depts to benefit
5	Future Forms – Potential Collaboration with HR, Finance, Nursing (e.g Replacement Form for Name Tag)	SCH	All	

2. Mapping of typical process of manual application received by Ops to identify bottlenecks, inefficiencies and areas of improvement

SCH - Support Ops' Process for Application of Keys (and Other Requests) - Current
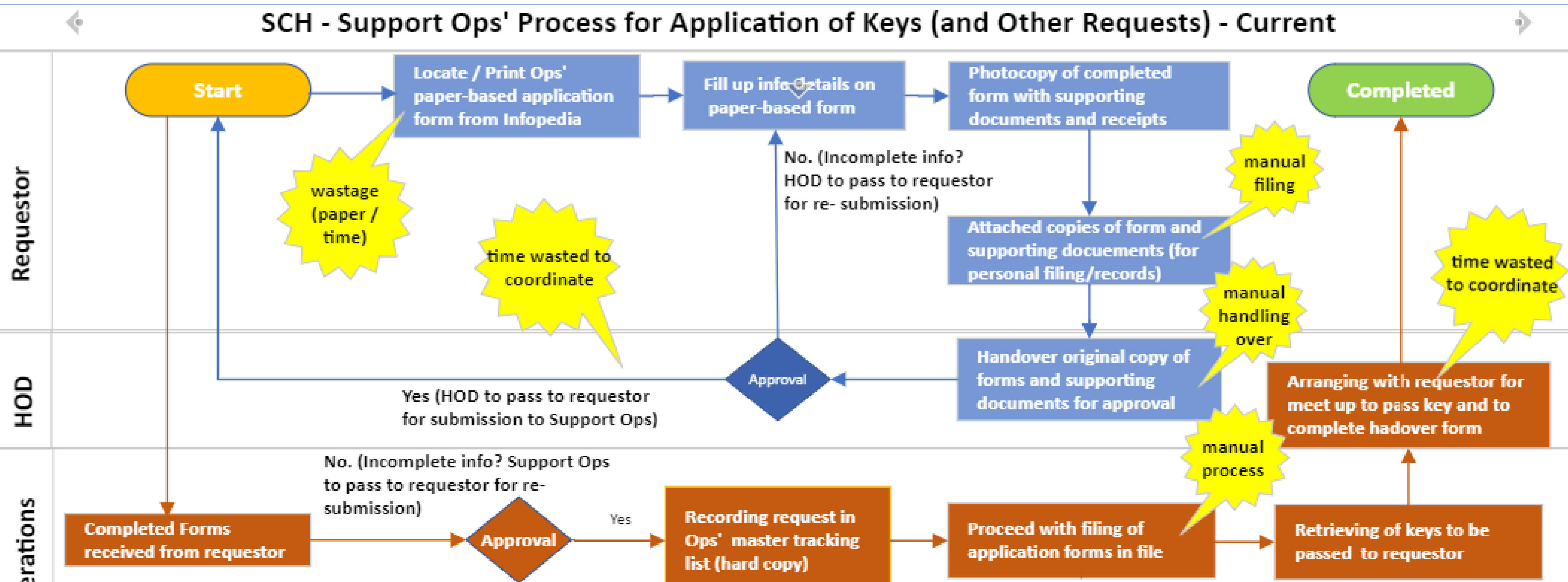
3. Designing eForms via nintex

- Automating of processes and solutions to workflow management easily and quickly through low-code, drag-and-drop design
- Enable automating and streamlining business processes by allowing users to design customized e-forms, reusing templates and modules
- Improved in efficiency of interaction among with domains through real-time status updates and workflow tracking through notification via emails
- For ease of generating data, tracking of number of forms submitted, accepted and rejected
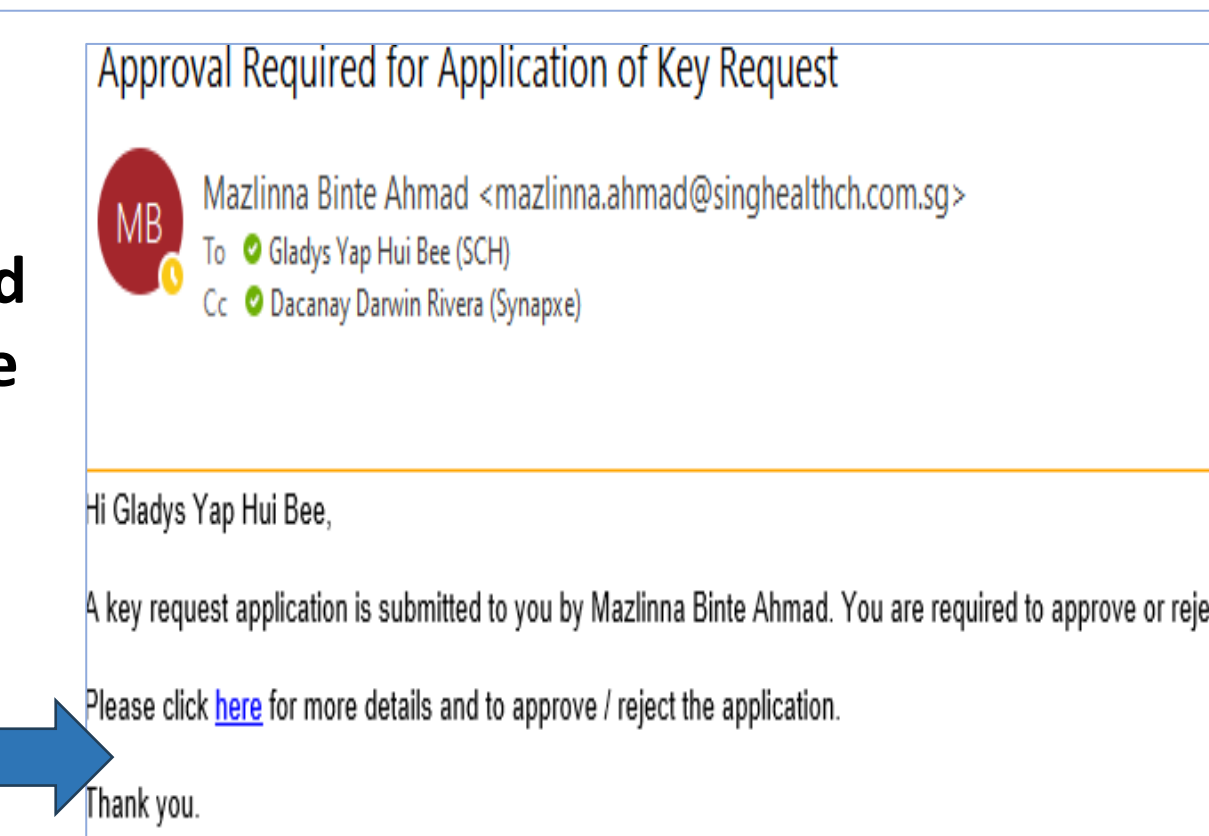
4. Developing Prototypes by applying current process to Nintex
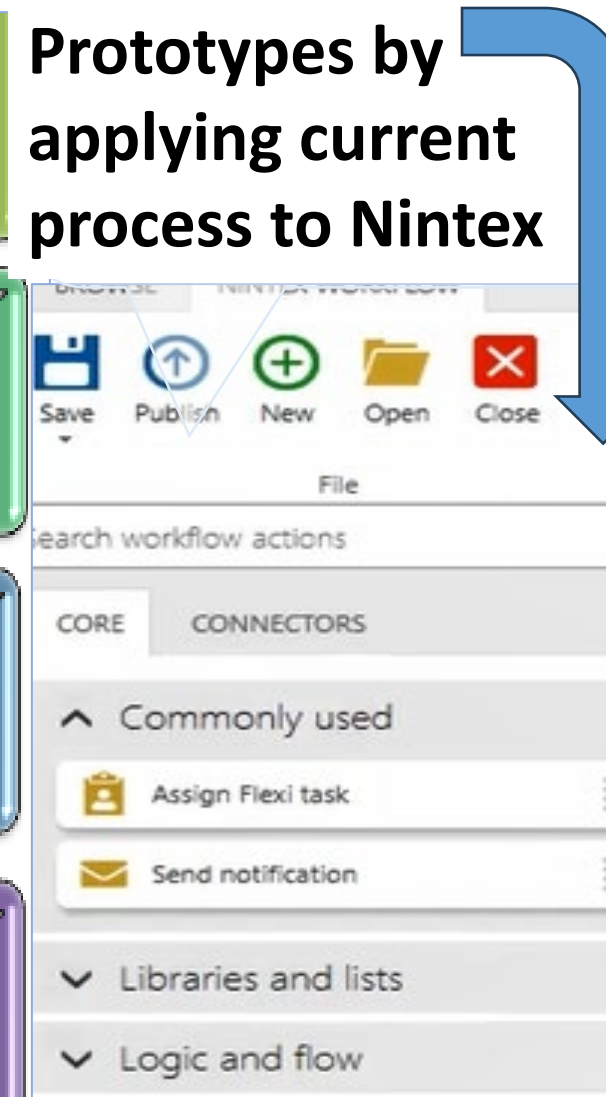
5. Granting approval rights to users via Nintex and undergoing UAT / Production to finalize on workflow
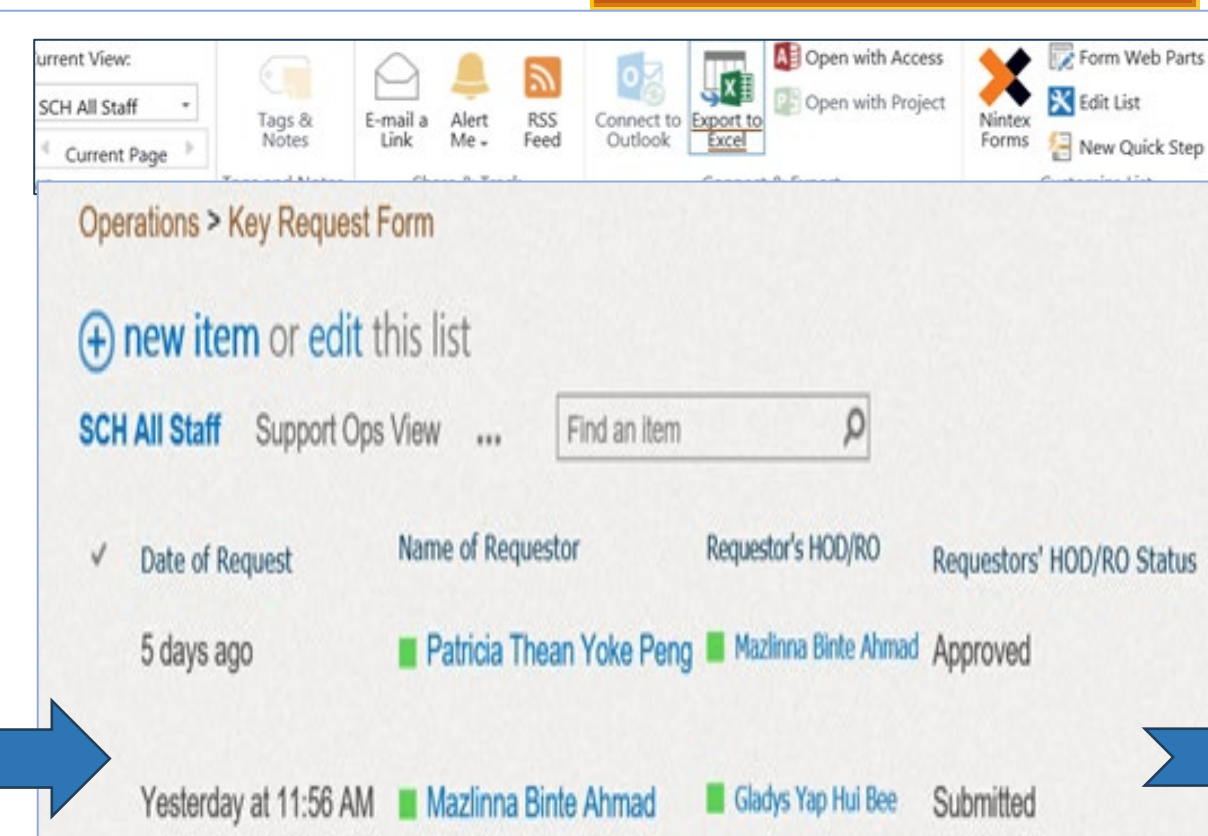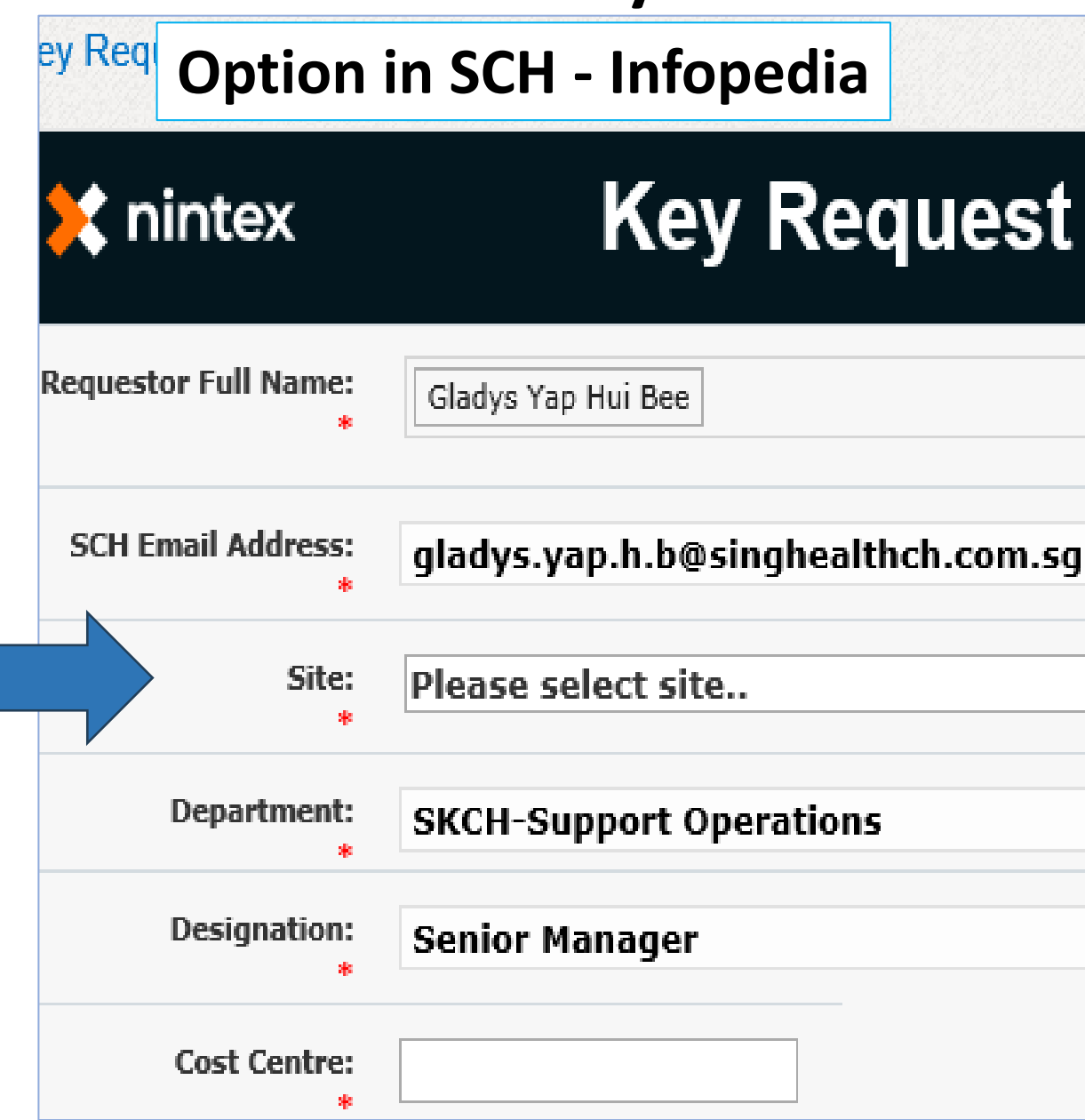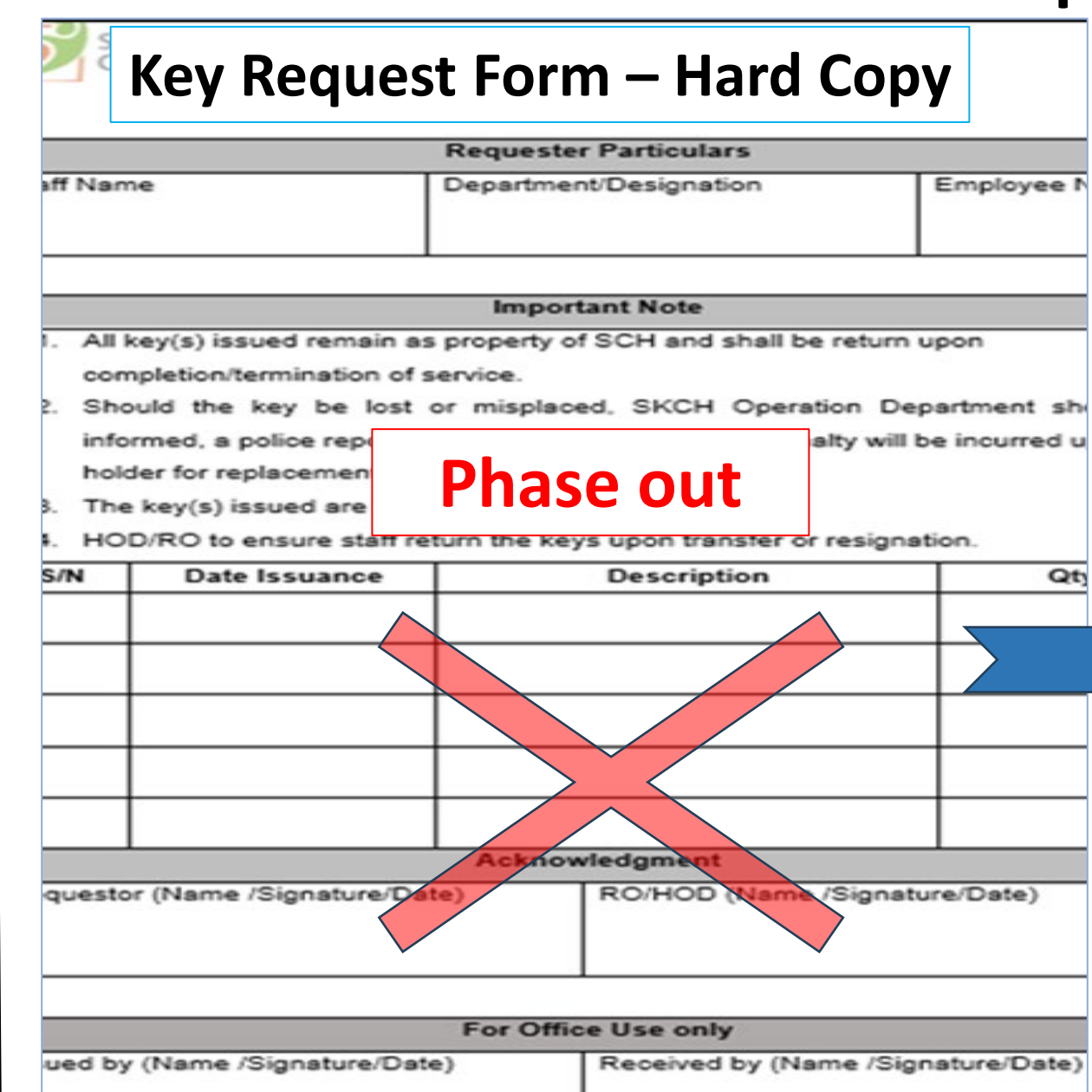
6. Testing out all requests submitted to ensure users are well captured via Nintex
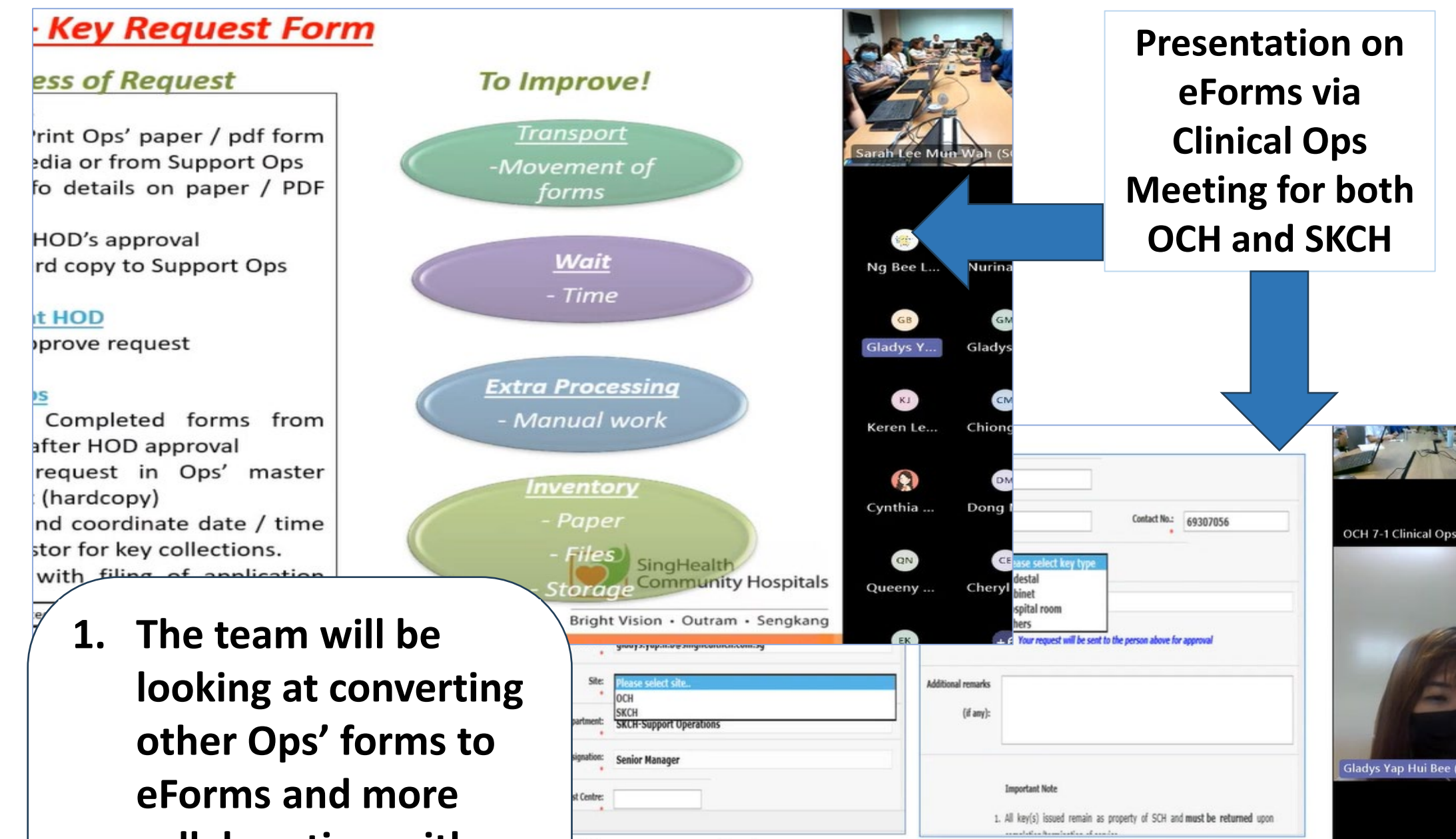
Results

eForm for "Key Request" was officially implemented via SCH's Docupedia in May 24. Application process was monitored closely with both qualitative feedback and quantitative data collated. Total processing time from Application to Approval has reduced by estimated of
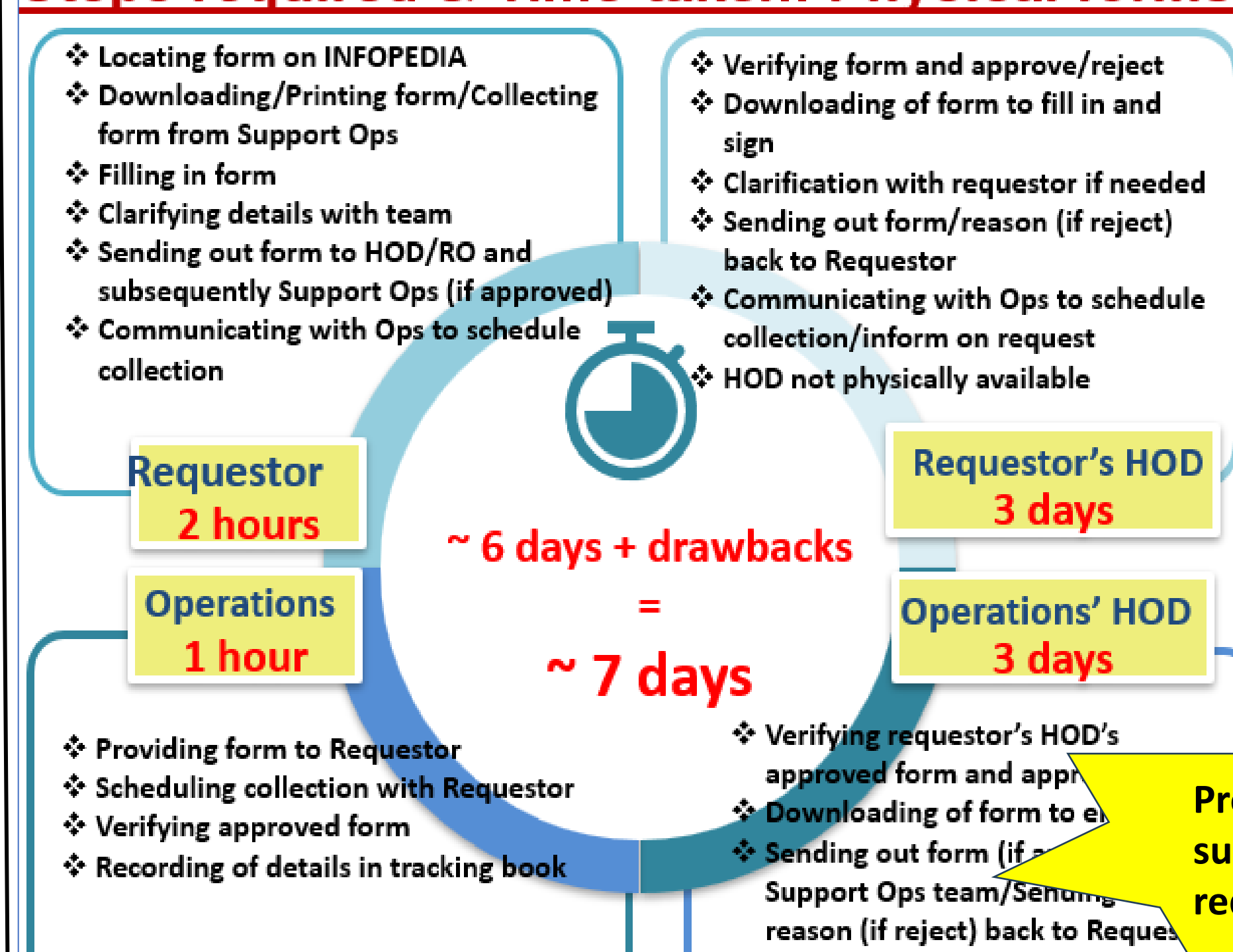
Key Request Form – Hard Copy
Phase out

Option in SCH - Infopedia
Option in SCH - Infopedia

Steps required & Time-taken: Physical forms

- Locating form on INFOPEDIA
- Downloading/Printing Form/Collecting form from Support Ops
- Filling in form
- Clarifying details with team
- Sending out form to HOD/RO and subsequently Support Ops (if approved)
- Communicating with Ops to schedule collection

- Verifying form and approve/reject
- Downloading of form to fill in and sign
- Clarification with requestor if needed
- Sending out form/reason (if reject) back to Requestor
- Communicating with Ops to schedule collection/inform on request
- HOD not physically available

Requestor 2 hours
Operations 1 hour
Requestor's HOD 3 days
Operations' HOD 3 days
~ 6 days + drawbacks = ~ 7 days

- Providing form to Requestor
- Scheduling collection with Requestor
- Verifying approved form
- Recording of details in tracking book

Steps required & Time-taken: Nintex forms

- Locating form on INFOPEDIA
- ~~Downloading/Printing Form/Collecting form from Support Ops~~
- Filling in form
- Clarifying details with team
- ~~Sending out form to HOD/RO and subsequently Support Ops (if approved)~~
- ~~Communicating with Ops to schedule collection~~

- Verifying form and approve/reject
- ~~Downloading of form to fill in and sign~~
- ~~Clarification with requestor if needed~~
- ~~Sending out form/reason (if reject) back to Requestor~~
- ~~Communicating with Ops to schedule collection/inform on request~~
- HOD not physically available

Requestor 30 mins
Operations 30 mins
Requestor's HOD 3 days
Operations' HOD 3 days
~ 1 day

- Verifying requestor's HOD's approved form and approve/reject
- ~~Downloading of form to endorse~~
- ~~Sending out form (if approve) to Support Ops team/Sending out reason (if reject) back to Requestor~~
- ~~HOD not physically available~~

Processing Time from submission to approval reduced by 80%!

Conclusion/Sustain

Sharing of new initiative and trainings were provided to users on how to access, complete and to submit eForms.

Presentation on eForms via Clinical Ops Meeting for both OCH and SKCH

1. The team will be looking at converting other Ops' forms to eForms and more collaboration with other depts / institutions
2. Idea has been well-received by Finance, Nursing and Human Resource
3. For a start, 2 sharing sessions conducted by Ops for various depts will be held in Jul 24, with intent to spread across the knowledge and feasibility for implementation.

Timeline

Yr 2023
- Understanding Nintex — 1st Meeting: Went through Nintex form and workflow creation, using "Request for Key Form" (July – Aug 23)
- Set requirements — Set regular meetings with Synapxe to finalize work process (Sep – Dec 23)

Yr 2024
- Create and Test — Creation of Nintex workflow and forms for various physical forms, and UATs for review and amendments (Jan – May 24)
- Go Live (Jun 24 onwards) — 1st Jun to go live for "Key Request Form"; Plan for next form to go live "Request for Mobile Allowance"; Other forms for conversion within Ops or other depts