

COUNTRY REPORT
Conference of Directors of National Libraries in Asia and Oceania
Annual meeting of 2017 – at the National Library of China, Beijing, China

Name of Country : Singapore
Name of Library : National Library Board
Name of Director : Ms Tay Ai Cheng (Deputy CEO, NLB)
Name of Contact Person : Ms Janice Ow
Mailing Address : National Library Board, 100 Victoria Street,
Singapore 188064
Telephone : +65 6332-1782
Facsimile : +65 6332-3611
Web Address : <http://www.nlb.gov.sg>
Email Address : Janice_OW@nlb.gov.sg

1 RELATIONSHIP TO GOVERNMENT

1.1 Review of the National Library Board Act

The National Library Board Act establishes and incorporates the National Library Board (NLB) as a statutory board and transfers to it the National Library and all matters connected therewith. The NLB Act also sets out the functions and powers of the NLB. Currently, NLB's Legal Deposit function is limited to the collection of print and audio-visual materials.

NLB is reviewing the Bill to expand this function to include digital and web resources to enhance its relevance in the digital age.

1.2 Special Libraries

The National Library provides professional library services to manage four Special Libraries for government agencies, such as Parliament, Ministry of Trade and Industry and SkillsFuture Singapore.

1.3 Research Services

The National Library provides professional and customised research services to government ministries and statutory boards. A team of researchers reports on the latest market trends and new developments in topical areas of interest to the respective organisations that subscribe to its services. The team provides customised research services to nine government agencies, including the Ministry of Communications and Information, Ministry of Manpower and Ministry of Culture, Community and Youth.

In 2016, the National Library began collaborations with the government's feedback unit, REACH Singapore, to provide curated resource guides to enrich the readings of Singaporeans to make possible informed debate during public consultation sessions and offer different perspectives on topics identified to raise the level of public discourse.

2 NLB FACTS AND FIGURES

Size of Singapore Collection (Physical)	\$7.55m
Physical Visitorship	\$26.4m

Digital Visitorship ¹	\$76.6m
No. of Library Loans	\$33m
Compliment to Complaint Ratio	490:1
Annual Operating Budget	\$247m
Total Staff	1,023

3 GENERAL OVERVIEW OF RECENT MAJOR DEVELOPMENTS

3.1 Public Access to the Legal Deposit Collection

The National Library allowed public access to its Legal Deposit collection from 20 November 2015. The public can search and locate Singapore’s published heritage from PublicationSG, a new online catalogue, and consult the materials on-site at the National Library Building. The Legal Deposit collection comprises over one million items published or produced locally, made available for sale or public distribution. The number of Legal Deposit materials made available to the public continues to increase with more than 11,000 new titles deposited with NLB in 2016.

3.2 National Info-Literacy Programme (NLIP)

The National Information Literacy Programme (NILP) was launched in 2013 to raise public awareness of information literacy and S.U.R.E. (Source, Understand, Research and Evaluate) principles in today’s complex information landscape. Workshops were organised for parents and working adults in the public libraries and the LLibrary. A public panel discussion, “*Cultivating & Nurturing Future Scientists*” was jointly organised with the National Research Foundation. Scientific leaders shared their discoveries and challenges they faced with verifying scientific information.

Three inter-school competitions, *Storyboard Contest*, *Historical Scene Investigation Challenge* and *Prove It competition* were organised for secondary students to learn and apply information literacy and research skills through problem solving and hands on activities. A total of 1,123 secondary students participated in these events. A series of talks and workshops covering tips on information literacy and NLB eResources were also conducted for students and teachers in the secondary schools and junior colleges. The contents of the talks were aligned with school curriculum and were well received by the students.

A variety of learning resources such as infographics, cheat-sheets, videos and student handbooks were produced. These self-directed learning resources covered diverse topics related to information literacy and research skills and are available for download from the S.U.R.E. website. The S.U.R.E. initiative also leveraged on social media to spread the S.U.R.E. message and engaged users through online quizzes, “Are you S.U.R.E.?”.

These efforts have attracted 5.3 million interactions since the launch and comprised digital interactions (S.U.R.E. website page views and Facebook interactions) and face-to-face interactions (training, programmes and interactions with S.U.R.E. content).

3.3 National Library Prominent Speaker Series

The National Library Prominent Speaker Series started in 2014 bring in notable speakers across different fields. This is part of the National Library’s direction to be a

¹ Refers to the number of downloads from NLB’s websites, subscribed databases and e-books.

premier public knowledge institution to support the nation's and citizens' knowledge aspirations.

Prominent Speakers in the talk series include:

- Dame Lynn Brindley (former British Library CEO);
- Nicolas Barker (Author and Renowned Book Collector);
- John van Wyhe (NUS Researcher and Expert on Darwin);
- Siew Hock Meng (Major Singaporean Artist);
- Dayne Cowan. Dayne is a Director of Film VFX at VHQ Post and has worked on blockbusters such as Batman Begins, 10,000 BC, The Bourne Ultimatum and Harry Potter and the Order of the Phoenix;
- Al Taylor (ex-RAF Airman who survived WW2);
- David Parry (Soil Scientist, Environmental Development Consultant and Curator);
- Leo Suryadinata (Sinologist and ISEAS Senior Research Fellow);
- Nigel Taylor (Director, Singapore Botanic Garden);
- Peter Overy (Creative Director, IDEO);
- Dr Farish Noor (Associate Prof, RSIS)
- Dr Evelyn Hu-Dehart (Prof, Brown University, USA)
- Ong Tze Boon (Group Executive Chairman, Ong & Ong)
- Prof Wang Gungwu (Lee Kuan Yew School of Public Policy)
- Lim Siong Guan (Group President, GIC Pte Ltd)
- Dr Shashi Jayakumar (Head, Centre of Excellence for National Security)
- Jason Lai (Principal Conductor, Yong Siew Toh Conservatory of Music)
- Prof Low Teck Seng (CEO, National Research Foundation)
- Tan Swie Hian (Cultural Medallion)

These talks were shared in social media through photos and videos (including interview sessions) to spread the awareness of the programmes.

3.4 Librarian's World

The National Library Librarian's World, started in 2016 to promote "Librarians as Thought Leaders" sharing on the National Library's collections and their significance.

Past topics in the talk series included:

- A Rare Collection Close-Up by Ong Eng Chuan, Senior Librarian
- Muhammad Ariff Ahmad & Masuri S.N. Collection - Collecting the past for the future by Juffri Supaat, Senior Librarian
- Singapore and South East Asian Collections by Ang Seow Leng, Senior Librarian and Irene Lim, Manager

These talks were shared in social media through live streaming in FaceBook Live, and photos to increase the reach of the programmes. The popularity of the programmes resulted in a monthly session for 2017.

4 NEW DEVELOPMENTS IN BUILDING AND MANAGING COLLECTION

4.1 Legal Deposit

To commemorate the 50th anniversary of Singapore's independence, more than a million Legal Deposit items were made accessible to the public on 20 November 2015 via an online catalogue – PublicationSG. As of 31 December 2016, the National Library has received a total of 573 reservations to view 1,287 items from this collection.

The National Library is continuing to build the Legal Deposit collection by engaging and collaborating with publishers and creators of heritage content. In 2016, the National Library conducted two networking sessions with commercial publishers and collaborated with three government agencies, as well as visited several education institutions' libraries to encourage submissions for Legal Deposit.

4.2 Heritage Collections

The National Library recently acquired a collection of historical photographs of the Singapore Botanic Garden and its surrounding area. The collection comprises 47 photographs dated 19th and early 20th century, including photographs by G. R. Lambert & Co. and Sachtler & Co., two prominent early photographic studios which were established in Singapore in the 19th century.



View of Singapore Botanic Gardens from across Holland Road, c. 1860s, by Sachtler & Co.



Cutting a road through the jungle, c. 1890, by G. R. Lambert & Co.

Other notable acquisitions include the following titles:



Seletar Rubber Estate, Singapore
Singapore: G.A. Fernandez & Co., 1910

This is a manuscript plan of the Seletar Rubber estate which was drawn up in 1910 by G. A. Fernandez & Co., a Singapore-based auctioneer, surveyor and architect. The plan is accompanied by a 5-page report on the Seletar plantation with details on the plantation layout, rubber and pineapple planting, recommendations for further rubber cultivation, estimates of future revenue and a valuation.

This set of manuscript plan and report of the Seletar Rubber Estate will be useful reference materials on the early economic history of Singapore as well as provide insights into the company and the rubber industry which were an important part of the local economy.



Fajar Asia

Syonan-to [i.e Singapore]: Pejabat Pembangunan Melayu Baru, 2603-2604 (i.e. 1943-1944)

This is a rare near complete set of 19 issues of the periodical, *Fajar Asia*, published in Singapore from 1943 to 1944. *Fajar Asia* is regarded as a significant and iconic propaganda publication produced during the Japanese Occupation. It was one of several Malay periodicals published in Singapore to propagate the Japanese concept of a Greater East Asia Co-Prosperity Sphere. It is also regarded by scholars as a key magazine in the development of modern Malay literature, and is one of the early publications that reflected Malay nationalism.



This is the first edition of Grotius's defence of the freedom of the seas and the right of all nations to trade throughout the world. The book, which is considered the pioneering text of modern international law, was graciously donated by Ms Agnes Tan. *Mare liberum*, or "The free sea" was first written as a chapter by Grotius in an earlier commentary which justified the Dutch capture of the Portuguese merchant vessel, Santa Catarina, in the Singapore Strait in 1603. Later, *Mare liberum* was published as an independent work to challenge the Portuguese claims to exclusive maritime trade rights in Southeast Asia due to their earlier discoveries.

4.3 Significant Donations

Notable donations in 2016 included:

- Rare World War II maps on Singapore and Southeast produced between 1911 and 1963 donated by Mr Lim Shao Bin, a collector and researcher. Many of the maps are currently showcased at the exhibition, "Surviving the Japanese Occupation: War and Its Legacies" currently on at the Former Ford Factory".

- Handwritten Qur'an and Javanese manuscripts dating from the 19th to early 20th century. The manuscripts were donated by Dr Farish A. Noor. One of the rare Quran manuscripts came with three double illuminated pages, including the Surah al-Fatihah (introductory prayer), the Middle Surah and Surah an-Nas (closing chapter).
- Unpublished typescripts of television dramas written for MediaCorp TV and radio by the station's scriptwriters. They provide valuable insights into the diversity of programmes produced by our local broadcasting stations over the years.
- The collection of the late Kuo Pao Kun, a Cultural Medallion Recipient and renowned figure in the Singapore theatre and literary scene. The Kuo family had donated Mr Kuo's collection of books to the National Library, majority of which are related to theatre, arts and culture, and with some containing annotations by Mr Kuo.

5 NEW DEVELOPMENTS IN PROVIDING ACCESS TO COLLECTIONS

5.1 National Library Exhibitions

The National Library organised a host of exhibitions including the "From the Stacks: Highlights of the National Library" (January to September 2016) featuring prized items from the library's collection of significance to Singapore's history and culture. The exhibition also included a roving display "Library Finds!", featuring unusual items in the library's holdings including menus, movie posters, handbills and remittance letters. as well as

Other exhibitions launched include "Script & Stage: Theatre in Singapore from the 50s to 80s" which explores the fascinating roots of local playwriting and theatre production, highlighting significant performances, playwrights and prominent theatre companies.

Additionally, the National Library collaborated with prominent Singapore multi-disciplinary artist Tan Swie Hian to present "Anatomy of a Free Mind: Tan Swie Hian's Notebooks and Creations", an exhibition that showcased the artist's notebooks donated to the library alongside his artworks to elucidate his creative processes.

5.2 Publications

The National Library published three books and four issues of the *BiblioAsia* journal. The book titles include:

- *Anatomy of a Free Mind: Tan Swie Hian's Notebooks and Creations*,
- *The Toshio Egawa Collection at the National Library Singapore: A Select Bibliography*
- *Song Ong Siang's One Hundred Years' History of Chinese in Singapore: An Annotated Edition*

These publications serve to increase the awareness of the National Library's collections as well as to encourage discovery and research into Singapore content. *Anatomy of a Free Mind: Tan Swie Hian's Notebooks and Creations*, was published in conjunction with an exhibition organised by the National Library held from 22 November 2016 to 23 April 2017. The *BiblioAsia* journal, published quarterly, was distributed to local and international libraries, academic institutions, government agencies and the general public. The e-version of the journal is now available online as well.

Besides books and journals, the National Library also published articles on Singapore Infopedia and HistorySG, two of NLB's online databases that provide authoritative resources on Singapore. Containing almost 2,000 articles, the Singapore Infopedia covers topics ranging from economy, geography, politics and government to heritage and the arts. In 2016, Infopedia saw 1.6 million visits and 3.3 million page views. Launched in 2014, HistorySG has 622 articles to-date and has garnered 385,263 visits and 699,171 pageviews in 2016.

5.3 Next Generation Libraries to Inspire Lifelong Learning – Public Libraries Development in 2017

Public libraries are social spaces to promote reading and learning as an attractive lifestyle. They are also positioned to ready Singaporeans for the digital economy. The next generation libraries are designed with seamless access to both digital and print collections, providing customised spaces to cater to different reading and learning needs and opportunities for collaborative learning. A total of four public libraries is reopening in 2017 after being revamped with new features and services to inspire people from all walks of life to learn together, learn from one other and inculcate the habit of life-long learning.

Each library's concept is developed based the demographic profile of the community, observation of users' behaviours as well as user feedback at community engagement sessions.

a) Sengkang Public Library

Sengkang Public Library (SKPL) is a mall library located at Compass One in the north-eastern region of Singapore. The library was re-opened on 18 March 2017, with a refreshed look and new features. It is the first library with a dedicated space for tweens aged 10 to 14. With greater integration of digital content and the physical collection, the library provides an engaging reading and learning experience for users.

The library's design is inspired by the area's history as a riverside port and fishing village, and takes reference from the shapes and colours of the coast. The revamp library offers a larger space with an 18% increase in floor area across two levels, providing more space for patrons to read and learn. The main entrance is located at level four with collections for Children, Tweens and Teens area and collections for adults are located at quieter level three.

The library offers a collection of approximately 125,000 books, 300 magazine titles and 4,000 audio-visual items. There is a 56% increase in the number of magazine titles, in response to high demand from users. There are materials for all age groups, in all four official languages.

SKPL is the first library to provide a dedicated space for Tweens, children aged 10-14 years old. This area is designed to support experiential learning. The space offers flexible seating to facilitate group activities, collaboration and creative expression

Adjacent to the Tweens' area, is a space for teens, specifically designed to reflect a more mature teen identity. It has a Doodle Wall which is writable and magnetic. The Doodle Wall is enabled by an interactive projector where users can interact with the projected image to create drawings and writings, to facilitate discussions. Magnetic accessories such as words and book display structures are also provided to encourage users to personalise the space. The Doodle Wall runs across the Tweens and Teens Areas.

The library offers an integrated display of physical and digital books providing users with a seamless browsing experience. Library users can browse the recommended digital books and download them via NLB's mobile app. The books are curated by NLB's librarians with different themes that are refreshed on a periodic basis.

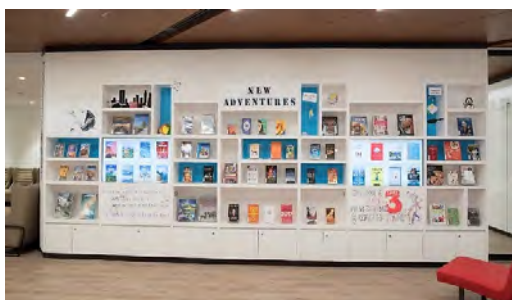
A Community Wall showcasing artworks contributed by community partners is a key feature of SKPL highlighting its close collaboration with the community.

The revamped SKPL offers a separate and well-insulated floor for adult readers on level three that enables users to enjoy reading in a quieter environment. This floor houses the Adult Non-Fiction, Language (Chinese, Malay and Tamil), and Singapore collections. The shelves incorporate front-facing displays to provide a more engaging browsing experience.

The Reading Lounge offers a space for users to indulge in intense reading. In response to high user demand, the new library offers eight multi-media stations, an increase from six stations previously.

The revamped SKPL was well received by the users on its opening day.

Photos of Services at Sengkang Public Library



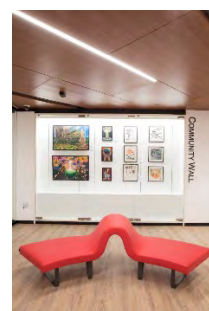
Integrated Display



Magazines Wall



Early Literacy Area



Community Wall with Artwork from Residents



Space for Tweens



Space for Teens



Adults Collections

b) Bukit Panjang Public Library

Bukit Panjang Public Library (BBPL) is located in western region of Singapore and its scheduled to reopen in 3rd quarter 2017. The library's design drew its inspiration from the transformation of Bukit Panjang town characterised by its new connection to the new Downtown MRT line. The new library adopted the idea of train journeys, past, present and future for its service concept.

The revamped library will be larger spanning over two wings with dedicated spaces for children in one wing and another for teens and adults. The split library space provides the opportunity to tailor the experience according to different age groups and at the same time, facilitate convergence of experiences and learning. The teens and adults wing offers the quiet and individual reading space while the children wing supports parent and children reading together. Spaces are designed for peer to peer sharing between parents and grandparents while supervising their children in the children's section so that they can discuss areas of interests, exchange information and recommendations.

BBPL will pilot a new immersive storytelling service for children aged 4 to 12. Children can experience the stories they hear with sound effects, lights and interactive, visual projections.

c) Tampines Regional Library

Tampines Regional Library (TRL) is located in eastern region of Singapore. As a Regional Library, it is a flagship library for the community in east serving a larger catchment area and it will be relocated to a new integrated community hub, One Tampines Hub. It is scheduled to reopen in the 3rd quarter 2017.

The new TRL will double its current size and offers differentiated reading and learning spaces for different user segments, and more distinct programmes and services. The library aims to foster a culture of creation through its offering of collaborative work spaces and maker space. The new maker space provides a platform for people to creatively experiment, prototype, share and test new ideas.

Local and heritage content are among some of the key highlights. Its location in a community hub provides the library with more opportunities for extensive community partnership.

d) Bedok Public Library

Bedok Public Library is located in eastern region of Singapore and is scheduled to reopen in 3rd quarter 2017. The library will be relocated to a new integrated community hub, Heartbeat@Bedok.

The library is designed to encourage reading and learning set amidst nature. As the community has a high profile of seniors, one of the key highlights of BEPL is the supporting and inspiring of older adults and seniors in the community through a dedicated causal space to learn, discuss and participate in interest-based activities. For instance, customized programmes are designed to help less IT-savvy seniors to pick up digital skills. The space also offers a targeted collection (large print collections) and other senior friendly services to build a community of active senior learners.

6 NEW DEVELOPMENTS IN OTHER SERVICES

6.1 MusicSG

MusicSG is a non-profit digital archive set up to digitise, archive and provide access to all forms of published Singapore musical works. It assembles a collection of music composed or published by Singaporeans, music produced or published in Singapore, and music related to Singapore.

In Mar 2016, NLB signed an agreement with Composers and Authors Society of Singapore (COMPASS), an organisation created to protect and promote the copyright interests of composers, authors and publishers of musical works and their related lyrics. Through this agreement, 750 more music tracks have been rolled out for public access and are available for full length streaming onsite and online. These tracks belong to defunct music companies and include music from the 1960s to the present and include genres such pop, *xinyao*, songs by music veterans, cultural medallion recipients as well as young contemporaries.

7 COLLABORATIONS WITH OTHER INSTITUTIONS (LIBRARIES, ARCHIVES, MUSEUMS)

7.1 National Union Catalogue (NUC)

The NUC is a comprehensive record of the collective holdings of libraries in Singapore and is a useful tool for resource-sharing locally and internationally. In 2016, the catalogue was made available to the public. The National Library Singapore met up with 24 libraries to communicate the changes to the NUC. The session was also an opportunity to encourage submissions for Legal Deposit. To date, 13 libraries have their catalogues opened to the public via the NUC.

8 NOTES ON INTERNATIONAL COLLABORATION

8.1 ASEAN Digital Library

The ASEAN Digital Library (ADL), (previously the National Libraries Asia Pacific), a project partly sponsored by ASEAN Committee on Culture and Information (COCI), is a platform that provides users with a seamless way to search for and to gain access to the wealth of digital materials held by the National Libraries in ASEAN.

The ADL pilot website was released with a total of 77,376 metadata records during the Regional Country Representatives Meeting held from 17-19 May 2016 in Singapore.

The event was hosted by the NLB and attended by representatives from the other nine ASEAN national libraries – Brunei, Cambodia, Indonesia, Laos, Malaysia, Myanmar, Philippines, Thailand and Vietnam.

The ADL website will be launched officially at the NLB's ASEAN 50th anniversary celebration in July 2017. The National Library Singapore is working with the ASEAN partner libraries to enrich the website content by adding more materials before the launch

8.2 Overseas Donations of pre-loved books

NLB has been actively providing pre-loved books to overseas schools, libraries and non-profit organisations who set up mobile libraries and community centres for the underprivileged. This year, NLB pre-loved books have been donated to Indonesia, Myanmar, The Philippines, Vietnam, Bhutan, India, Nepal and the Palestine.

8.3 International Advocacy Programme – Asia and Oceania Regional Workshop

NLB and IFLA Regional Office co-hosted the Asia and Oceania Regional Workshop in Singapore on 31 October and 1 November 2016. A total of 24 delegates participated in this workshop. The International Advocacy Programme (IAP) is a new IFLA capacity-building programme designed to promote and support the role libraries can play in the planning and implementation of the UN2030 Agenda and the Sustainable Development Goals (SDGs). The IFLA IAP aims to establish an engaged community of advocates who will clearly articulate the significant opportunities to increase the profile and impact of library and information professionals in the achievement of SDGs. As part of the IAP, IFLA is launched a call for proposals to request funding to implement regional or national awareness-raising and capacity building activities in 2017 and 2018. The deadline to submit the proposals was 3 March 2017.

8.4 Preservation and Conservation Training at the National Archives of Singapore from 20 – 24 February 2017

Three conservators from the National Archives of Singapore (NAS) were previously invited to the National Library Myanmar (Yangon Branch) to conduct training on Preservation and Conservation. NAS is an institution under the NLB, Singapore. The Phase One training was given to 21 librarians at the Children's Library of the National Library branch in the premises of the National Museum of Myanmar from 13 to 18 September 2015. Phase Two of the training includes an attachment of five colleagues from the National Library of Myanmar, including Dr Kay Thi Htwe, to be trained in Singapore on preservation and conservation of paper-based archival materials. The training was conducted at the Archives Conservation Laboratory of the NAS from 20 to 24 February 2017.

8.5 NLB – Sarawak State Library staff exchange from 16 – 18 March 2017

A delegation from the Sarawak State Library participated in a staff exchange in Singapore from 16 to 18 March 2017. This exchange is part of the MOU agreement that was signed between NLB and Sarawak State Library in early 2016. While in Singapore, the delegation had discussions and site visits to the National Library, National Archives of Singapore and various public libraries. They also attended the launch and participated in a tour of the newly renovated Sengkang Public Library.

9 EDUCATION AND TRAINING

9.1 Professional Development for Library and Archives Staff

NLB introduced webinars and webcasts offered by overseas organisations such as the American Library Association and School Library Journal to support staff's continuing professional development. Such online learning enables staff to gain access to training content that are not available in Singapore, without the need to travel overseas.

The National Library and Public Libraries organised 41 professional sharing sessions for staff on new library services, library service improvement projects they participated in, as well as knowledge and skills acquired from local or international conferences they attended. About 1500 learning places were achieved from the sessions.

NLB embarked on a project to identify functional competencies and develop career pathways for the Library and Archives job families. A learning roadmap will then be mapped out for Librarians, Archivists and para-professionals to develop the required functional competencies, for them to build a career specializing in library and archives functions. The project is to be completed in May 2017 and the competencies will be shared with the library community at appropriate platforms.

NLB's frontline staff continued to attend courses on services for users with special needs, so that they could better address the needs of the wide user base that NLB serves.

9.2 Regional Training Projects with the Singapore International Foundation

Eight librarians from the National Library and Public Libraries conducted four training workshops for librarians from the General Sciences library, Ho Chi Minh City on various aspects of library operations. The training workshops are part of the Words on Wheels project by the Singapore International Foundation, which offered opportunities for NLB librarians to share their knowledge and skills with fellow librarians in the region, as well as learn about how libraries operate in the region.

9.3 Centre for Professional Development

NLB is in the process of setting up a Centre for Professional Development to oversee the development of functional competencies for the library and archives professionals.

The Centre is expected to be:

- the engine of change in nurturing future-ready library and archives staff
- the enabler to enhance professionalism and achieve career aspirations of library and archives staff
- the driver in inculcating the culture of continuous learning and professional development

9.4 NLB's Scholarship and Sponsorship Programme

NLB awarded five Undergraduate scholarships, two Post-graduate scholarships, and one Undergraduate sponsorship for the recipients to pursue Bachelor and Master's degrees in subject disciplines relevant to NLB's content and services. This is part of NLB's commitment to staff development as well as building a good team of trained professionals and future library leaders who will help the Board in achieving its vision of building learning communities and a knowledgeable nation.

10 LIBRARY ASSOCIATION OF SINGAPORE (LAS)

10.1 Training and Development

a) Executive Library Management Programme (ELMP)

The Executive Library Management Programme (ELMP) opened for applications in December 2016. The programme will be held from 13 February to 30 June 2017, and the programme is organised in collaboration with the NTU Wee Kim Wee School of Communication and Information. Professors Brendan Luyt, Alton Chua and Joanna Sin will be the main instructors for the programme, together with guest speakers drawn from senior staff and leaders of local libraries.

b) WSQ Training

Between July 2016 and December 2016, the following WSQ courses were conducted with 18 participants per module:

- Support Bibliographic Control (Training: 12 to 14 July 2016; Assessment: 22, 27 to 28 July 2016)
- Support Collection Maintenance (Training: 14 to 15 September 2016; Assessment: 28 to 29 September 2016)
- Support Acquisitions and Serials Work (Training: 8 to 9 Nov 2016, Assessment: 23 and 24 Nov 2016).

c) UXLibs-in-a-Day Workshop by Andy Priestner

LAS organised two UX workshop sessions at the Singapore Management University (SMU) Libraries on 15 and 16 December 2016 with a total of 60 participants.

d) Professional Sharing – Data Analytics: Turning Data into Insights and Strategies: A Sharing of Experiences

NLB and LAS co-organised a professional sharing on using data analytics for NLB staff and LAS members in Mar 2017. The session was attended by more than 100 participants.

10.2 Learning Trips

a) Visit to the newly revamped Pasir Ris Public Library

A learning visit was organised for 25 LAS members to the revamped Pasir Ris Public Library on 28 July 2016, where participants were introduced to a unique teens' space managed by teens for teens and a DIY origami club managed by volunteers who also contribute their art pieces to the curation of book displays.

b) Sharing of Learning Points from Conferences

Joan Wee, Senior Librarian, NTU Libraries and Chow Chai Khim, Librarian, NUS Libraries shared their learning points and takeaways from IFLA conference 2016 and 8th QQML International Conference 2016 respectively.

10.3 LAS awards

The LAS Awards for Lifetime Contribution, Professional Service, Passion and Outstanding Newcomer, together with the LAS Overseas Library Professional Development Sponsorship and LAS –WLIC Grant will be given out at the 2017 AGM.

10.4 Professional Development Scheme (PDS)

There were 64 Practicing Professionals under the PDS scheme as at 30 March 2017.

10.5 Memorandum of Understanding between the Australian Library and Information Association (ALIA), the Library Association of Singapore (LAS) and Library & Information Association of New Zealand Aotearoa (LIANZA)

LAS, ALIA and LIANZA had signed a MOU on 12 October 2016 to collaborate and promote Library and Information sector across the 3 countries and represent the sector's work at an international level (IFLA). The immediate collaborative effort of this MOU is to organise the Library and Information sector Gold Coast Conference in 2018.

10.6 Singapore Journal of Library and Information Management

The 2016 issue, volume 45, of the Singapore Journal of Library and Information Management was published and uploaded at: <http://www.las.org.sg/wp/sjlim/>

10.7 Libraries for Tomorrow Conference 2016

The *Libraries for Tomorrow* conference 2016 was held on 20 September 2016 at Matrix Auditorium @ Biopolis and attended by 320 librarians and information professionals.

The theme “*Smart Libraries for Tomorrow: Disrupt and Innovate*” was chosen as it signified the dynamic evolution of the information landscape, and the challenges and opportunities present to libraries and information professionals. The programme included two keynote sessions by Mr Tan Kok Yam Head, Smart Nation Programme Office, and Mr Andy Priestner, an experienced consultant in User Experience, together with 13 presentations and five poster sessions.

Additionally, Mr Andy Priestner conducted two sessions of post-conference workshops on UX in Libraries for 60 participants (30 participants per session).

11 DEVELOPMENTS IN ACADEMIC LIBRARIES

11.1 NUS Libraries

a) Facilities Improvement

i) Science Library Facilities Renewal

The Science Library went through a facility renewal in December 2016 to upgrade its premises and utilities. The revitalization provided students and faculty with a more welcoming and conducive environment. Open stacks were consolidated to create more user space. The last phase of the upgrading works was completed by March 2017.

ii) Collaboration Space @ Central Library

The Central Library repurposed the Multimedia-Viewing Room and configured it as a Collaboration Space in October 2016. The new space was equipped with flexible furniture and research workstations installed with specialised software and connected

to large and high-resolution screens for data visualisation. The new space served as a test-bed for the library to understand user behaviour and use cases, as well as foster emergent ones. Since its launch, the Collaboration Space had been well-received and well-used by the students.

iii) **Self-Service Reserve Books and Readings (RBR)**

NUS Libraries had progressively implemented self-service loans for the RBR collections in all its Special Libraries. The RFID and electromagnetic detection systems were used to ensure security of the collections. The Medical Library and C J Koh Law Library implemented self-service at the end of 2016, with Hon Sui Sen Memorial Library and Science Library following in 2017. The Hon Sui Sen Memorial Library also piloted the use of the self-service model for other materials such as study carrel keys, peripherals for discussion rooms, newspapers and intralibrary loan books in 2017. We had implemented more self-service facilities to meet the challenges of having a reducing pool of operation associates.

b) Scholarly Communication

i) **Collaboration in Research: Connect Digital Scholarship (DS) Community**
The NUS Digital Scholarship Team organized two workshops at the NUS Central Library.

- “Digital Humanities: Who’s doing What?” by four speakers from NUS, SMU and SUTD, in May 2016
- "Heritage Interfaces: Presenting Cultural Specificity in Digital Collections", comprising of a panel of 15 international experts, in April 2016. That workshop facilitated new connections between local DS researchers with the international community, and is the first in Singapore to include librarians in the dialogue.

ii) **Collaboration in Research: Rollout of Symplectic Elements**

In February 2017, NUS adopted Symplectic Elements as its Research & Information Management System (RIMS). NUS Libraries, together with the Office of Deputy President (Research & Technology) and the Computer Centre, collaborated on the initiative, with NUS Libraries helping to create awareness and promote ORCID IDs. The NUS Libraries was also an integral part of the Elements support team, who, together with the two aforementioned departments, worked to help researchers use the new system more effectively.

c) Learning Services

i) **Supporting Research Needs**

The Researcher Unbound programme, a series of workshops and talks aimed at supporting doctoral students and researchers through all stages of the research and publication life cycle was rolled out successfully. It was first launched for the NUS Business School in 2016, and after reviewing feedback and demographics of the participants, the new Learning Services Team adapted the programme to cater to the entire NUS research community. Workshops on literature searching, reference management, patents, bibliometrics and talks on writing and publishing were conducted.

ii) **Innovative Pedagogy Methods**

NUS Librarians explored several methods of teaching information literacy to students, and found the PESTLE (Political, Economics, Social, Technology, Environmental) method to be the most suitable as a framework of enquiry. First used to guide students to search for information in an Engineering module, the PESTLE framework will be

formally adopted in the Ridge View Residential College's (RVRC) revamped foundation module GEM1917, to help students think critically in evidence-based learning.

iii) Exploring and applying online tools to support learning

NUS Librarians explored a variety of freeware and online tools to make information literacy programs more compact and engaging. Kahoot was the most widely adopted tool, used by several resource teams for both orientation and information literacy sessions. It was easy to use for both librarians and students, and engaged students of various levels from undergraduates to graduate students.

iv) Creating online videos to support learning

Several online videos were created on academic writing, searching for evidence, citation styles and research methodology for RVRC, Engineering and Arts faculties. The online videos for the Faculty of Arts and Social Sciences module were created as a resource to support the flipped classroom adopted by the lecturers.

d) Building Capabilities

77 (82%) of NUS Librarians attended a certified service design thinking course in 2016 and early 2017, which was focused on understanding, planning and implementing innovative services or products. The three-day course conducted in three runs, guided participants from ideation through to user-centric research, implementation and refinement.

NUS Librarians undertook a study trip each to the US and the UK, to gain exposure to other academic library environments and also learn best practices from prominent libraries.

e) Social Responsibility

i) NUS Day of Service

The NUS Libraries held the first #WeWalkWith event, in which 20 volunteers visited the Lions Befrienders Senior Activity Centre at Ghim Moh, and made a difference in the lives of elderly residents. The event was our first attempt at giving back to society and our participation in the NUS Day of Service where NUS gives back to the community through action and service.

f) Academic Libraries Collaboration

i) NUS, NTU and SMU Libraries' Information Literacy (IL) Roundtable

Heads of Learning or Instructional Services of NUS, NTU and SMU Libraries met and will continue to meet quarterly to discuss various issues affecting information literacy, such as, the roles and responsibilities of Heads in up skilling IL librarians and so on. One of the initiatives the Roundtable started was to have IL librarians from the three university libraries observe each library's ILPs. The purpose was to learn from each other through observation and discussions. Librarians who attended each library's ILPs shared their feedback and learnt from each other.

11.2 NTU Libraries

a) Organizational restructuring

NTU has appointed Professor Schubert Foo as Deputy Associate Provost (Information and Knowledge) to oversee the newly formed Office of Information, Knowledge and

Library Services (OIKLS). The Library will be undergoing significant transformation in the coming few years, with new directions and ideas for the future.

b) Supporting research activities

The Library continues to take a leadership role in supporting research data management. A Data Management Plan (DMP) is now a requirement for researchers at NTU, and our team has been providing well attended workshops for faculty and researchers in how to think about their data management needs. A new data repository using the open-source platform, Dataverse, is under development and will be released for use by the NTU community in 2017. We will manage and support this repository, and work to make appropriate linkages to our institutional repository, and other university platforms as needed.

The Library introduced a new altmetrics service to complement other research impact services. Having subscribed to PlumX, we have been using this back-end analytics platform to display altmetrics information on individual articles in our repository and discovery systems, and we began offering a personalized faculty/researcher profile service upon request. There is increased interest in altmetrics as an indicator of reach and impact, particularly among disciplines not well served by citation measures.

Our digital scholarship collaborations continue to grow in number and disciplinary scope, with our first engineering project being released in 2016. “Unsaturated Soil Mechanics for Sustainable Urban Living” is a major project making substantive research information on soil mechanics particular to the conditions in Singapore openly available for further use. The Library was also a collaborative partner on the DIHA project (Digital Intangible Heritage of Asia), an indication of our growing knowledge and contribution in the area of digital scholarship.

c) Supporting teaching and learning

The compulsory Information Literacy for Undergraduates (ILUG) programme introduced in 2015, has now successfully integrated both the foundation and advanced modules across all Schools/Colleges. Using a blended learning approach and close collaboration with faculty for contextualizing meaningful information literacy discussions within disciplinary contexts, student and faculty feedback has been overwhelmingly positive regarding the perceived usefulness of the programme. The Library was also invited to create a required programme for postgraduate research students, and we began delivering a multidisciplinary, three-hour seminar for all research students in October of 2016. All research students (PhD and Masters by Research) are required to attend the seminar within the first year of their studies. The seminar focuses on methods for information discovery and management, and on introducing the scholarly communication landscape including publishing, data management and research impact.

We initiated a peer observation programme for our instructional classes this semester with the goals of sharing of good practices, providing a supportive feedback mechanism, and improving our overall instructional capabilities. We are also piloting three different types of student learning assessments to help us construct a more comprehensive assessment plan for our information literacy programmes as the next phase of development.

One of our professors using our course blog service won an NTU Teaching Excellence award for his innovative use of technology in teaching. He advocates the use of course blogs to encourage peer learning, and to help students acquire practical digital literacy

skills, which the Library helps to teach. We consider digital literacy to be a part of information literacy, and are incorporating more and more of these types of skills into our information literacy programmes.

d) E-book Gallery

To make largely invisible e-book collections more discoverable, the Library conceptualized and developed an e-book gallery integrating several data sources to provide constant streaming of thematically displayed e-book covers onto a large 4x2m screen. The gallery is a central feature of our upcoming renovations in our main library, harmonizing virtual and physical space. A unique feature complementing the visual display is the ability to interact with the gallery on an individual basis via smaller screens situated in front of the gallery or via an app on tablets or smartphones.

e) International Cooperation

In the area of international collaboration, we offered our intensive, month-long library management internship (PIPIL - Professional Internship Programme for International Librarians) in 2016 to librarians from the ASEAN University Network, continued our staff exchange programmes with Shanghai Jiao Tong University and Xiamen University and welcomed a Visiting Librarian from Henan University of Science and Technology for a one-year programme. We also remained active this year in LATN (Libraries of Australian Technology Network), IATUL (International Association of University Libraries), and AUNILo (Libraries of the ASEAN University Network).

11.3 Singapore Management University Libraries

a) Research Skills Training

SMU Libraries offers a series of learning programmes that is mapped to the academic term. Research Librarians work closely with Faculty to embed timely research and critical thinking skills for both undergraduate and postgraduate students. Each student in SMU has a learning roadmap as can be seen in the schematic representation below.

Overview: Learning Programmes

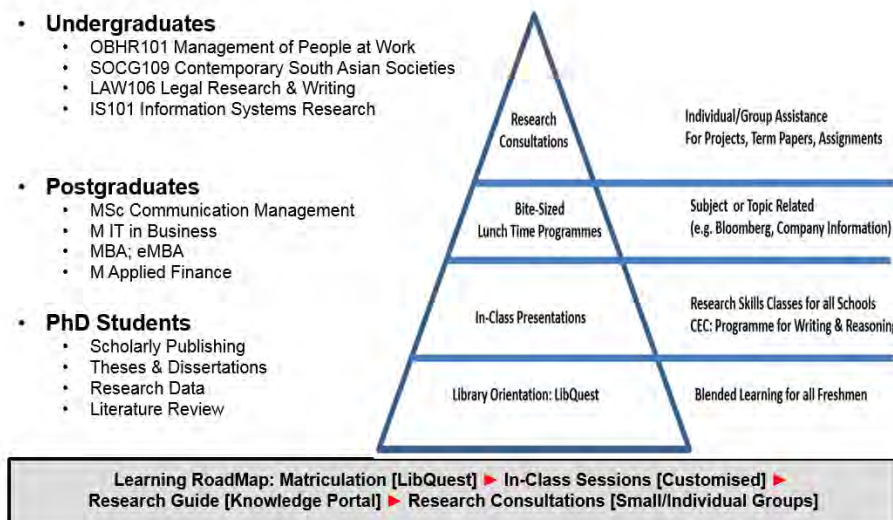


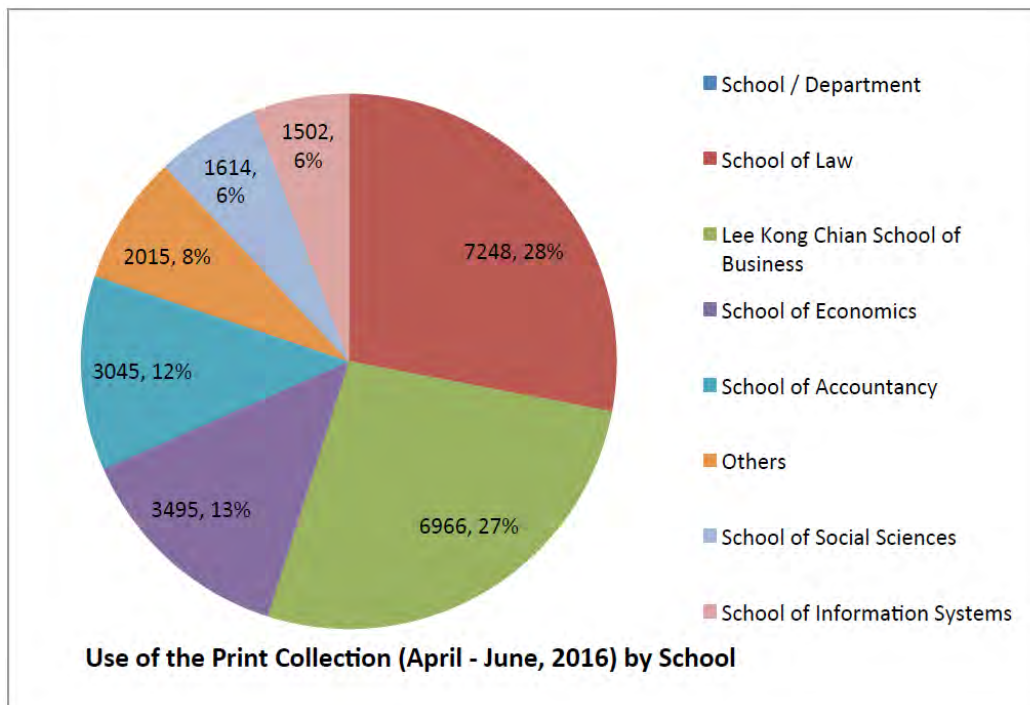
Fig 1: Learning Framework

b) Research Support

The Research Publications module of the Integrated Research Information System (IRIS) was officially live on 4 January 2016. It is now used to enter the records of SMU research publications and the information is fed to Faculty CV, SMU publications website and SMU's open access repository called [InK](#). InK hit 1 million downloads in April 2016, less than 6 years after it was launched in January 2010. InK had 16,664 records and over 4,500 full text as at April 2016.

c) QlikView – SMU Libraries’ Dashboard

In April 2016, SMU Libraries and Integrated Information Technology Services launched QlikView a data analytics and visualization dashboard that highlights usage of services and resources according to set criteria. The chart below is a report reflecting use of the print collection according user group.



d) Joint Conference and Meeting of Business Librarians – 16 to 19 May 2016

83 delegates from 22 countries attended the Joint Conference and Meeting (JCM) representing the Academic Business Library Directors (ABLD), European Business Schools Librarians’ Group (EBSLG) and the Asia Pacific Business School Librarians’ Group (APBSL) held at the Li Ka Shing Library, Singapore Management University. The conference theme was “The Way Forward: Smart, Savvy, Sustainable.”

e) eResources Day (16 Sep 2016)

SMU Libraries’ eResources Day was held on Fri 16 September, and aimed to promote and increase stakeholders’ awareness of the library’s electronic resources. 15 vendors (such as Capital IQ, CEIC, IEEE and Westlaw) joined this inaugural event. There were more than 800 booth visits by undergraduate and postgraduate students. The feedback was overwhelmingly positive, with most participants commenting that they benefited and became more aware of the library’s e-resources.

f) Kwa Geok Choo Law Library

We had been focusing on the new Kwa Geok Choo Law Library project for the past 3-4 years. The project finally came to an end in December, when the law collection was moved to the new library just before Christmas 2016 after the building, facilities and technology implementation. The Library opened its doors on 3rd January 2017.

11.4 NIE Library

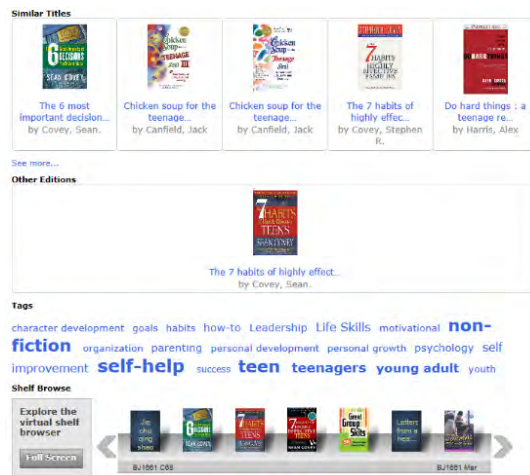
a) Research Support

The NIE Library introduced the Library Liaison Programme and the Citation Report Service as part of its research support services in 2016. The former aims to foster communications between the Library and stakeholders and the latter provides support in compilation of reports to the candidates of the Promotion & Tenure Exercise. A data repository and data curation services are also in the pipeline.

b) Library Technologies

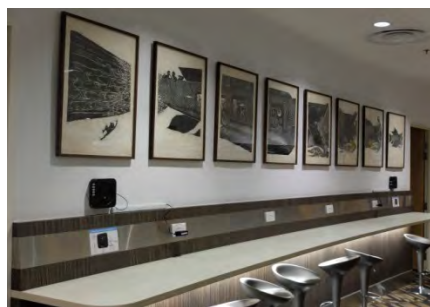
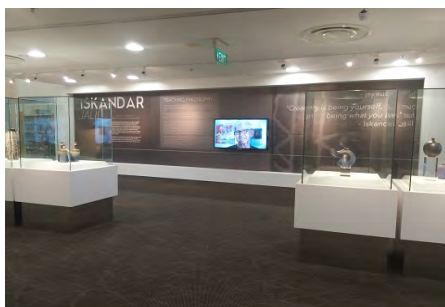
Digital initiatives such as Blue Cloud Analytics Platform and People Counter System were introduced to track users' behaviour and aid in collection development.

The LibGO! Mobile Application was upgraded with a refreshed user interface, an E-newspapers Corner was designed for browsing of local newspapers and popular international magazines via iPads, and the library catalogue was enhanced with recommendation feature to provide a better user experience.

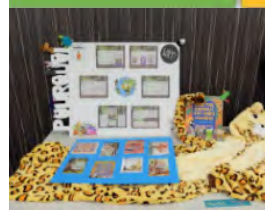


c) Collaborations & User Engagement

Works from Iskandar Jalil, Singapore's Master Potter and leading educator-mentor in ceramics art, and selected artworks by local and regional artists were showcased in the Library to promote arts appreciation and inspire arts creation.



The Library continues to work with stakeholders and industry partners on collaborative initiatives such as online quiz and author workshops to create awareness of resources and issues in academic publishing; infographics in support of the International Open Access Week; Children's Literature Book Fair and showcasing of students' work on children's literature to engage academic staff and students, and work shadowing programme as part of the community involvement efforts.



11.5 Singapore Polytechnic Library

a) Online Information Literacy Package

An online information literacy package was developed and rolled out in April 2016. The e-learning package aimed to teach information literacy skills in an engaging and interactive manner through the use of bite-sized videos, infographics, animations, curated content and learning activities. This package was integrated into the course content for the General Education 1 and 3 modules taken by all the institutions' Year 1 and Year 2 students respectively. The Library and the General Education module team from the School of Communication, Arts and Social Sciences, collaborated so that relevant sections of the package were completed by the students at the appropriate time in the schedule for the modules. Students were required to submit certificates of completion to their lecturers as evidence that they had successfully completed the learning activities within the sections.

To build on the basic information literacy skills taught in the package, additional resources and customised packages were also developed for the General Education and other course modules. These were intended for students to extend their learning and deepen application to course-specific domains of knowledge. Examples included

in-class search activities specific to topics being discussed and a supplementary package for a business module, which helped students learn how to find information from relevant databases for their projects. For the business module, face-to-face sessions were used to provide hands-on guidance for those who had difficulties searching the databases and answer questions from those who attempted the learning activities.

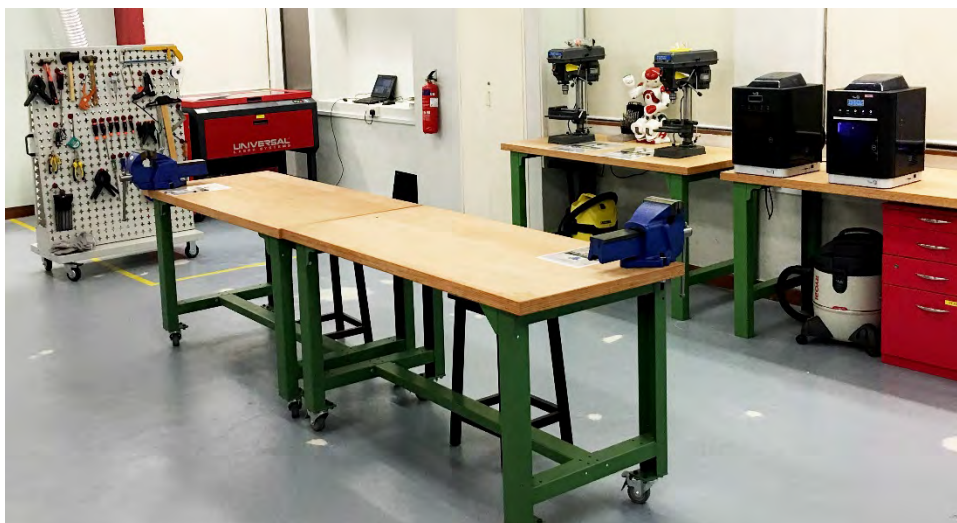
b) Transforming Library Spaces

Level 2 of the Main Library re-opened in October 2016 after Phase 2 renovation of the entry floors. This new space invites users to begin their journey of exploration and discovery through spacious exhibition areas showcasing students' innovations and emerging technologies and exhibits to promote learning. Users' interest is also piqued through resources like the latest magazines and books, and the sensory experience of the Materials Wall which displays innovative materials ranging from wood and stone to plastics. The space has a wide and open feel yet also provides collaboration pods and interaction areas.



c) Makerspace FabLab

A new facility, the FabLab@Library, was added to the Library's Makerspace. The facility is part of the FabLab network on campus coordinated by the Engineering schools. The FabLab provides access to a laser cutter, 3D printers and a wide palette of tools, such as drilling machine, sanding machine, vinyl cutter and scroll saw. This facility enables Makerspace users to progress from the tinkering level to the building of prototypes, fabricating and engraving models, and working on more advanced projects. Skilled technical staff are on hand to train and assist students.



11.6 Lien Ying Chow Library

a) Read your way up! Campaign

In support of NLB's National Reading Movement, Ngee Ann Polytechnic (NP) Library has organized a suite of activities to promote reading from Jun to Aug 2016. This includes a Library Book Fair where NP staff and students selected and borrowed titles on-the-spot, an e-Resources Day where students visited the e-resources booth to learn tips on use of Library's subscribed databases, a Spot-A-Reader Activity and a Book Sharing competition where students share on books that influenced them.

b) Blended learning & outreach to Schools

NP Library enhanced its outreach to the Schools through the integration of e-Learning on specialized Information Skills into targeted modules in Blackboard. The e-Learning package covers narrated videos and slides and includes multiple choice questions to track students' learning outcomes and scores are auto-tabulated in Blackboard's Gradebook. Experiential learning through learning journeys were organized for students. The activity requires students to visit the different facilities and collections in the library and search for the information using the library catalogue.

A more targeted approach to reach out to the Schools through dialogue session with the School's Course Chairs, sharing of e-resources in the School's professional sharing sessions and briefings at senior management meetings were initiated.

c) Improvements in the review of e-resources

Since Jun 2016, an in-house e-stats application was developed to capture the login access by the Schools for the e-databases subscribed by the library. Unlike the usage statistics provided by database vendors that only captures accesses by IP address, the e-Stats application provides the percentage of access of a database by the specific schools. This data analysis is extremely useful to facilitate the management, evaluation and decision making by the Schools and Library.

d) Digital services

Easy access to new titles was implemented in Library's Discovery & Delivery system. It provides the sorting of new titles relevant to the Schools and this complements the physical copies of new titles in the library displayed.

A Textbook Submission Portal was rolled out on 14 Feb 2017. The online approach cut down the paper submission as lecturers could create, update and delete their submission online. This process has also facilitated the operational workflow of liaising with the vendor to bring in sufficient stocks on time for students' purchase.

e) Ngee Ann Polytechnic Oral Archives

NP Library continued its oral history recordings and transcription of the recordings for NP's past principals, Council Chairmen and older staff of NP.

11.7 Temasek Polytechnic Library

a) TP archives and digital preservation

In February 2016, online access to the Temasek Polytechnic (TP) archives collection was launched. Browsing and searching for information about TP couldn't be simpler via the Library's one-stop resource discovery service, LIBsearch. A new tab, TP Archives – was introduced in LIBsearch to provide users the convenience of finding all things about TP.

To view the collection, users have the option to select from these categories:

- ephemera (brochures, posters, and the like)
- memorabilia (TP collectibles and souvenirs)
- photographs (of TP events, people and places)
- publications (campus newsletters and commemorative publications)
- videos (TP musicals and video productions)

Total collection size has grown to 33,000. The collection comprises born digital and digitized objects in various file formats, such as but not limited to PDF, JPG, TIFF and MP4. The total number of views recorded since its launch was more than 120,000. The numbers are encouraging and it spurs the Archives team to push ahead to collect and manage digital assets for the institution.

b) Smart View Project

TP Library has implemented a Smart View POC project to show crowd density in the Library using video analytics. A total of 20 cameras have been deployed in the Library. 15 cameras were installed at the lift lobbies of the public access levels of the Library for people-counting while the remaining 5 cameras were installed at staircases to test the video analytics solution's loitering detection capability. With Smart View, patrons can get relevant crowd information at a glance and avoid the crowded floors. With the success of this POC, similar implementations will be rolled out in appropriate spaces of the Polytechnic.

c) Info-Literacy Training for Tertiary Students

TP Library develops and conducts basic and customized library instructional programmes for both full-time and part-time students at the polytechnic. The programmes are offered in various formats, such as e-learning, hands-on workshop and lecture briefing.

In recent years, an increasing number of these programmes offered are blended – instructional content is learnt online before the class session, while in-class time is devoted to activities and facilitation. Use of social, collaborative tools such as Kahoots, Linoit, and Padlet in class are popular, encourages active learning and improves learning outcomes.

The instructional programmes follow a tiered-approach:

i. Resource Library Awareness

Targets at freshmen, this module introduces students to the online services and resources accessible from the Library website and catalogue. It is usually offered as a lecture briefing or library tour with some interactive activities.

ii. Basic Research

In this step-up module, students are taught the use of the Web Discovery Portal and research databases to find needed information. Info-literacy competencies such as identifying appropriate information tools, formulating search strategies, evaluating and citing information sources are introduced.

iii. Customised Research

This module concentrates on discipline-specific research and expands the students' awareness of subject-specific resources and information searching skills. It is usually offered 2nd or final year students embarking on their major projects.

Library also introduced 2 new IL functional roadmap (ILFR) programmes for staff; A primer in digital preservation and Resource library essentials. Both programmes were very well received.

d) Copyright Custodian

TP Library is the Copyright Custodian, responsible for spearheading the copyright management of the institution. Given that copyrighted subject matters are increasingly pervasive over conventional and new digital media, and that copyright issues are cross-cutting in educational environment, the Library also chairs the Copyright Management Group (CMG), a cross-school/department entity. The Library together with CMG manage copyright-related activities including education, promotion, compliance and the development of resource materials for use within the schools.

One of the first tasks on the to-do list was the launch of the Copyright Portal which provides information about copyright such as:

- Copyright basics and dos & don'ts
- FAQs to provide answers to common queries about the right use of copyrighted materials
- Terms & Conditions of use of electronic resources
- Copyright Management Form for submission of s52 records (for multiple copying)
- Further reading materials

Submitted by:

Ms Tay Ai Cheng
Deputy Chief Executive Officer,
National Library Board