

# **Employment of Professional Engineers in Key Government Positions**

## 1.0 Executive Summary

The government aspires to grow Malaysia to become a developed, inclusive nation. Professional Engineers (PEng) who have the attributes and experience can directly contribute to nation building to capacitate them to hold key government positions especially in "highly technical" Ministries and States. With technical knowledge, scientific and systems thinking, Professional Engineers (PEng) can develop and translate policies; and implement and monitor projects; as good as their Administrative and Diplomatic Officer (PTD) counterparts. This proposal provides the strategy and role of IEM to prepare pools of Professional Engineers (PEng) as candidates to fill key government positions.

### 2.0 Purpose

The purpose of this paper is to propose the enlistment of Professional Engineers in key government positions to allow more engineers to contribute to the nation's growth as well as improve the public-sector delivery. It also outlines the strategy for both the government and IEM to implement this initiative.

#### 3.0 Background

- **3.1** Our government is committed to its reform agenda by creating a new path towards a better future for Malaysia as a developed and inclusive nation. According to the new priorities and emphases stated in the Mid-Term Review of the Eleventh Malaysia Plan, the premise to achieve the above goal is on the principles of good governance, strong institutions and integrity.
- **3.2** The government's pledge to enhance efficiency of public service is the first of six pillars of the Mid Term Review. The intent is to reform governance towards greater

transparency and enhance efficiency of public services by, among others, undertaking extensive reforms in the overall administrative policies and practices to ensure the delivery of better and faster services to the *rakyat* and businesses. This requires the public service to be more flexible, innovative and responsive to embrace future challenges. In this regard, the government is prepared to rationalise the existing structures for agility, while ongoing initiatives to innovate and redesign public service delivery will be intensified.

3.3 Based on the commitment to reform, future government development projects will continue to be technically challenging, involving sophisticated and complex engineering-related areas, undertaken via highly transparent procurement process. To ensure public funds are prudently spent, projects are delivered on time, and the resultant investments are providing the expected value, government agencies implementing nation building projects, as well as those safeguarding high-value government assets, should be strong, reliable institutions helmed by competent leaders with high integrity having sound technical knowledge, relevant industry exposure and intricate decision-making experience.

#### 4.0 Basis of Consideration

This proposal is aligned with the current public sector employment policy of the government. The recommendation is not difficult to implement since it only provides options in selection of candidates to hold key government position. There are already precedence set before such as Dato' Sri Ir Dr Zaini Bin Ujang who is the Secretary General of Ministry of Environment and Water (KASA), Dato Ir Dr Siti Hamisah binti Tapsir, Secretary General of Ministry of Science, Technology and Innovation (MOSTI) and the late Dato'Ir Dr Radin Umar who had held various senior positions in government agencies.

#### 4.1 Current Scenario

4.1.1 Presently, most key government positions (Secretary General equivalent) within Federal and State Governments are majority filled by public service personnel of Administrative and Diplomatic Officer (PTD) category. Although the current policy states that these positions are "open", it is very rare officers from other category within the public sector or professionals from the private sector are appointed to these

positions.

- 4.1.2 Professionals especially engineers are not given sufficient opportunity to assume leadership role i.e. to lead those ministries/agencies that are highly technical in terms of content. Based on current practice, there seems to be limited pathway for Professional Engineers within the public sector to be appointed as Secretary General and State Government Secretary. Even in the highly technical uniformed services operating billions ringgit worth of high-tech military/defence systems, Professional Engineers within the Arm Service are not normally considered for the Chief of Army, Navy, Air Force let alone, the Chief of Armed Forces positions.
- 4.1.3 The idea to liberalize key government positions is nothing new. In 2013, "Saraan Baru Perkhidmatan Awam" (SBPA) scheme was introduced to increase the productivity of the public sector as part of Government Transformation Program (GTP). Thirty-six (36) premier posts involving Secretary General and Director General positions were identified as "open", recognizing the importance of subject matter expert to assume the top level of management and professional group hence, encouraged "mobility" and "cross-fertilization" to allow the posts to be filled by personnel from the industry as well as by those within the government. However, due to unforseen circumstances, SBPA scheme was later discontinued.
- 4.1.4 Benchmarking the practices in neighbouring country, "open door" policy is adopted to fill senior public sector positions. Using the criteria and selection process depicted in the table below, the government not only head-hunt suitable candidates to fill a vacant position, but also accept personal applications through the Public Service Division. Selected candidates are then subjected to rigorous selection process of which, the interviews are conducted by a neutral appointing body convened by the Public Service Commission.

| Key Criteria   | Selection Process  |
|--|--|
| Open to the public sector, private sector and academia   | Rigorous selection process   |
| Employs a meritocratic system  | Interviewed by a neutral appointing body - Public Service Commission                         |
| Personnel are selected based on:  Abilities Commitment to serve the nation Strong personal and work ethics | No restrictions for public and private sector nominees (including engineers) to be appointed |

#### 4.2 Rationale

- 4.2.1 Based on the attributes attained as early as during university, PEng are appropriate to fill key government positions especially those in Ministries and States that handles highly complex technologies and numerous new and emerging technology projects. The PEng, who is also a Fellow of the Institution of Engineers Malaysia (IEM), should have attained maturity level qualified to lead a ministry and their appointment will not only enrich the organization with technical know-how, but also enhance the ministry's capability to plan, implement and evaluate national development programs as expected of a Secretary General, as specified in "Pekeliling Am Bil 2 Tahun 1982".
- 4.2.2 In addition, Professional Engineers would be appropriate to lead ministries/agencies that have high technical content since a technically-inclined person would have;
  - a. better understanding of the issues facing engineering-related industries and its developmental needs for policy generation, national level strategy and planning, budgeting and regulation for public safety;
  - b. sound knowledge in project management best practices in ensuring implementation, progress monitoring and completion of projects undertaken by the ministry and its agencies; and
  - c. structured risk assessment and decision-making approach when committing government's Development Expenditure (DE) and Operation Expenditure (OE) funds for the acquisition of supplies, works and services.
- 4.2.3 From competency perspective, PEng would have gone through "3E" mill (Education, Experience, and Ethics) as mandated by the Board of Engineers, Malaysia. This means, they have;
  - a. undergone tertiary education which strongly emphasis on among others, Problem Analysis, Usage of Modern Tools, Environment and Sustainability, as

well as Project Management & Finance, as required by the Engineering Accreditation Council (EAC), Malaysia;

- b. sufficient industry exposure from the on-job-training and gather engineering decision making experience as mandated in accordance with the Engineers Act 1967; and
- c. been subjected to the code of professional ethics in accordance with the Engineers Act 1967 which accentuate engineers to make the right decisions as required by the Acts and Laws of Malaysia.
- 4.2.4 It is acknowledged that there will be an issue if the government employs PEng who are not from within the government service to fill key government positions. This gap, mainly knowledge in government procedures however, can be systematically resolved by providing all required training through the cooperation with the National Institute of Public Administration (INTAN).

## 5.0 Implication

This proposal has no direct implication on the current public sector employment policy. It only promotes a more open candidate selection prior to appointment to key government positions.

#### 6.0 Conclusion

Professional Engineers would like to actively contribute to nation building by offering themselves to fill key government positions. In this case, IEM will assist in establishing pool of talents as candidates.

#### 7.0 Recommendation

**7.1** As an organization that promotes the interest of the profession, IEM is concerned of Professional Engineers being denied the opportunity to serve the nation at the highest echelon of the public sector. In ensuring the nation's machineries are effectively helmed by competent technically inclined talents, IEM is committed to play

its role in facilitating the employment of Professional Engineers in key government positions. In this context, the following are proposed:

- a. **Candidates.** Personnel to be considered as candidates to fill vacant key government positions must be a Professional Engineer registered with the Board of Engineers Malaysia and a Fellow of IEM. Preference are given to retired government servants having the above credentials as well as renowned industry figures from the private sector that are familiar with public sector systems. IEM will device a suitable mechanism to identify the candidates accordingly.
- b. **Key Government Positions Suitable for Engineers.** Positions appropriate to be filled by technically inclined leaders are those with the following criteria;
  - i. Ministries and agencies that regulate engineering-related industrial sectors, both in terms of economics and safety policies or operates/maintains technologically sophisticated and complex systems.
  - ii. Ministries, agencies and states that deal with acquisition of works, supplies and services that involve technologically sophisticated and complex systems which demand in depth understanding of engineering-related industrial sectors for purpose of strategic planning, policy generation and project implementation.
  - iii. States that emphasis heavily on engineering-related industrial sectors as their main development agenda.

Based on the above, thirty-two (32) positions listed at Annex A have been identified suitable to be filled by senior Professional Engineers.

c. **Proposal for Government Consideration.** Once any of the above listed position is vacant, IEM will propose to the government by submitting "IEM Candidate List" for consideration and evaluation by the selection committee.

7.2 The above is expected to complement the government's intent to enhance the public-sector delivery. It is hoped that appointment of Professional Engineers to key government positions on contractual basis to secure top talent in critical fields with flexible pay structures and outcome based Key Performance Indicators (KPIs) is implemented with success in coming years.

**7.3** IEM requests the government to seriously consider employing Professional Engineers with the grade of Fellow with IEM in key government positions to accelerate the nation's growth as well as improve the public-sector service delivery as planned in the 11<sup>th</sup> Malaysia Plan. IEM also urge the government to accept IEM Candidate List as the institution's sponsored nominees to fill the thirty-two (32) identified positions as and when they are vacant.

Public Sector Engineers Special Interest Group, Institution of Engineers, Malaysia

24 June, 2021

# ANNEX A

# **KEY GOVERNMENT POSITIONS SUITABLE FOR ENGINEERS**

|         | Organization / State                               | Position   |
|---------|--|--|
|         | Prime Minister's Department                        | Chief Secretary to the Government                    |
|         |  | Director General - Implementation Coordination Unit  |
|         | Ministry of Finance                                | Director General - Public Private Partnership Unit   |
|         | Ministry of Home Affairs                           | Inspector General of Police                          |
|         |  | Director General - Msian Maritime Enforcement Agency |
|         | Ministry of Education                              | Secretary General                                    |
|         |  | Director General                                     |
|         | Ministry of Energy and Natural Resources           | Secretary General                                    |
|         | Ministry of Environment and Water                  | Secretary General                                    |
|         | Ministry of Transport                              | Secretary General                                    |
|         | Ministry of International Trade and Industries     | Secretary General                                    |
| Ļ       | Ministry of Science, Technologyand innovation      | Secretary General                                    |
| FEDERAL | Ministry of Communications and Multimedia          | Secretary General                                    |
| FED     | Ministry of Defence                                | Secretary General                                    |
|         |  | Chief of Armed Forces                                |
|         |  | Chief of Army  |
|         |  | Chief of Navy  |
|         |  | Chief of Air Force                                   |
|         | Ministry of Agriculture and Food Industries        | Secretary General                                    |
|         | Ministry of Rural Development                      | Secretary General                                    |
|         | Ministry of Works                                  | Secretary General                                    |
|         |  | Director General of Public Works                     |
|         | Ministry of Plantation, Industries and Commodities | Secretary General                                    |
|         | Ministry of Housing and Local Government           | Secretary General                                    |
|         | Ministry of Federal Territories                    | Secretary General                                    |
| STATE   | Pulau Pinang                                       | State Government Secretary                           |
|         | Selangor   | State Government Secretary                           |
|         | Melaka   | State Government Secretary                           |
|         | Negri Sembilan                                     | State Government Secretary                           |
| လ       | Johor  | State Government Secretary                           |
|         | Sabah  | State Government Secretary                           |
|         | Sarawak  | State Government Secretary                           |