

| No                                    | Criteria   | Unit for KPI                  | Target 2018 | UniSZA Target 85% | JUMLAH (Semua Fak/ CoE) |
|---------------------------------------|--|-------------------------------|-------------|-------------------|-------------------------|
| <b>SECTION A: General Information</b> |  |                               |             |                   |                         |
| 1                                     | <b>Total number of academic staff (permanent/contract staff)</b>               |                               |             |                   |                         |
|                                       | a. Number of academic staff (including staff on study leave) (FTE)             | i. Professor (FTE)            | 55          | 532               |                         |
|                                       |  | ii. Associate Professor (FTE) | 73          |                   |                         |
|                                       |  | iii. Senior Lecturer (FTE)    | 186         |                   |                         |
|                                       |  | iv. Lecturer (FTE)            | 218         |                   |                         |
|                                       | b. Number of active academic staff (FTE)                                       | i. Professor (FTE)            | 55          | 442               |                         |
|                                       |  | ii. Associate Professor (FTE) | 72          |                   |                         |
|                                       |  | iii. Senior Lecturer (FTE)    | 170         |                   |                         |
|                                       |  | iv. Lecturer (FTE)            | 145         |                   |                         |
|                                       | c. Total number of active S&T academic staff (FTE)                             |                               | 180         |                   |                         |
|                                       | d. Total number of active Non S&T academic staff (FTE)                         |                               | 262         |                   |                         |
|                                       | e. Percent of active S&T academic staff  |                               | 40.7%       |                   |                         |
|                                       | f. Total number of active foreign academic staff (FTE)                         |                               | 42          |                   |                         |
| 2                                     | <b>Total number of fulltime students (including local &amp; undergraduate)</b> |                               |             | 9198              |                         |
|                                       | a. Number of local and foreign undergraduate                                   | a. Bachelor (LOCAL)           | 6709        | 6750              |                         |
|                                       |  | b. Bachelor (FOREIGN)         | 41          |                   |                         |
|                                       | b. Number of local and foreign postgraduate students                           |                               | 1345        |                   |                         |
|                                       | <i>PhD</i>   |                               | 661         |                   |                         |
|                                       | <i>Postgraduates by Research</i>   |                               | 1327        |                   |                         |
|                                       | <i>Postgraduates (Foreign)</i>   |                               | 451         |                   |                         |
|                                       | <i>Masters (Local)</i>   |                               | 525         |                   |                         |
|                                       | <i>Masters (Foreign)</i>   |                               | 159         |                   |                         |
|                                       | i. <i>Masters by Research (Local)</i>  |                               | 508         |                   |                         |
|                                       |  | Full Time                     | 433         |                   |                         |
|                                       |  | Part Time                     | 151         |                   |                         |
|                                       | ii. <i>Masters by Research (Foreign)</i>                                       |                               | 158         |                   |                         |
|                                       |  | Full Time                     | 152         |                   |                         |
|                                       |  | Part Time                     | 12          |                   |                         |
|                                       | iii. <i>Masters by Coursework (Local)</i>                                      |                               | 17          |                   |                         |
|                                       |  | Full Time                     | 17          |                   |                         |
|                                       |  | Part Time                     | 0           |                   |                         |
|                                       | iv. <i>Masters by Coursework (Foreign)</i>                                     |                               | 1           |                   |                         |
|                                       |  | Full Time                     | 1           |                   |                         |
|                                       |  | Part Time                     | 0           |                   |                         |

|   |           |     |  |  |
|---|-----------|-----|--|--|
| v. PhD (Local)  |           | 369 |  |  |
|   | Full Time | 281 |  |  |
|   | Part Time | 266 |  |  |
| vi. PhD (Foreign)   |           | 292 |  |  |
|   | Full Time | 289 |  |  |
|   | Part Time | 9   |  |  |
| vii. Doctoral Level Coursework (Local)                      |           | 0   |  |  |
|   | Full Time | 0   |  |  |
|   | Part Time | 0   |  |  |
| viii. Doctoral Level Coursework (Foreign)                   |           | 0   |  |  |
|   | Full Time | 0   |  |  |
|   | Part Time | 0   |  |  |
| (c) Number of PhD (research mode*) graduated in the year    |           | 25  |  |  |
| (d) Number of Master (research mode*) graduated in the year |           | 26  |  |  |

### SECTION B: Quantity and Quality of Researchers

|   |   |  |     |     |     |     |
|---|---|--|-----|-----|-----|-----|
| 1 | Total number of academic staff involved as principal investigator of                        | a. University funded   | 163 | 311 | 150 | 163 |
|   |   | b. National grants   | 115 |     | 130 | 115 |
|   |   | c. Industry grants   | 21  |     | 40  | 21  |
|   |   | d. International Grants  | 12  |     | 10  | 12  |
| 2 | PhD or Professional Qualification   | a. Total number of staff with PhD/DSc,   | 265 |     | 265 |     |
|   |   | b. Total number of staff with Professional   | 15  |     | 15  |     |
| 3 | Research Experience (3 cohorts)   | a. >50 years old   | 98  | 442 | 98  |     |
|   |   | b. 40 – 50 years old   | 181 |     | 181 |     |
|   |   | c. < 40 years old  | 163 |     | 163 |     |
| 4 | Awards/ stewardship conferred by national and international learned and professional bodies | a. Total Number of <b>Awards</b> Conferred by <b>International</b> Academic and Professional Bodies for Research       | 5   |     | 13  | 5   |
|   |   | b. Total Number of <b>Recognitions/ Stewardships</b> Conferred by <b>International</b> Academic and Professional       | 4   |     | 13  | 4   |
|   |   | c. Total Number of <b>Awards</b> Conferred by <b>National</b> Academic and Professional                                | 8   |     | 13  | 8   |
|   |   | d. Total Number of <b>Recognitions/ Stewardships</b> Conferred by <b>National</b> Academic and Professional Bodies for | 9   |     | 20  | 9   |
|   |   | e. Research Exhibition Awards (gold medal / special awards)  | 21  |     | 25  | 21  |

### SECTION C: Quantity and Quality of Research

|   |              |  |                            |     |     |     |
|---|--------------|--|----------------------------|-----|-----|-----|
| 1 | Publications | a. Total number of publications in SCOPUS/WOS/ERA                                  | i. Journals                | 692 | 700 | 692 |
|   |              |  | ii. Conference Proceedings | 143 | 200 | 143 |
|   |              | a. iii. Total number of publications in SCOPUS/WOS/ERA - <b>Joint Publications</b> | iii. 1. Industrial         | 82  | 150 | 82  |
|   |              |  | iii. 2. International      | 171 | 150 | 171 |
|   |              |  | iii. 3. National           | 275 | 260 | 275 |

|   |   |   |  |                 |              |             |
|---|---|---|--|-----------------|--------------|-------------|
|   |   | b. Publication Impact   | i. Total Citations                             | 3261            | 5000         | 3261        |
|   |   |   | ii. No. of articles in Q1 & Q2                 | -               | -            |             |
|   |   |   | iii. % of articles in Q1 & Q2                  | -               | -            |             |
|   |   | c. Total number of publications in other  |  | 362             | 500          | 362         |
|   |   | d.i. No. of research books  |  | 50              | 50           | 50          |
|   |   | d.ii. No. of chapters in research books   |  | 80              | 100          | 80          |
|   |   | e. Policy papers  |  | 7               | 8            | 7           |
|   |   | f. Other publications (case study, technical reports, articles in magazines, newsletters, original writings and |  | 0               | 90           |             |
| 2   | Research grants for academic staff                        | a. Total Amount of Public Funds from Government Agencies/ Parent Bodies/ Home Universities/ Main Campus:        | i) Total Amount Pledged from New Projects      | -               | -            |             |
|   |   |   | ii) Total Amount Received from Active Projects | RM 4,371,448.00 | RM 5,000,000 | RM4,371,448 |
|   |   | b. Total amount of private/industry fund(including contract research):  | i) Total Amount Pledged from New Projects      | RM -            | -            |             |
|   |   |   | ii) Total Amount Received from Active Projects | RM 341,687.00   | RM 500,000   | RM341,687   |
|   |   | c. Total amount of international fund   | i) Total Amount Pledged from New Projects      | RM -            | -            |             |
|   |   |   | ii) Total Amount Received from Active Projects | RM 654,026.00   | RM 500,000   | RM654,026   |
| 3   | Research Expenditure for All Projects (Data from Bursary) | a. Total Amount of Research Grants Received in the Year   |  | RM 5,367,161.00 | 56%          |             |
|   |   | b. Total Amount of Research Grants Spent  |  | RM 3,000,000.00 |              |             |
| <b>SECTION D: Quantity of Postgraduates</b> |   |   |  |                 |              |             |
| 1   | Number of PhDs graduated                                  | a. Total number of PhD graduates in the   |  | 7               | -            |             |
|   |   | i. Local  |  | 2               | -            |             |
|   |   | ii. International   |  | 5               | -            |             |
|   |   | <b>b.# of PhDs Graduated</b>  |  | <b>25.00</b>    | <b>19</b>    | <b>25</b>   |
|   |   | c.Number of PhDs Graduated within 7 Semesters or 42 Months  |  | 7               | -            |             |
|   |   | d.Percentage of PhDs Graduated within 7 Semesters or 42 Months  |  | 100%            | -            |             |

|  |   |  |                    |              |        |  |
|--|---|--|--------------------|--------------|--------|--|
| 2  | Number of Masters Graduated   | a.Total Number of Masters (Research Mode) Graduated in the Year                            | 26                 | -            |        |  |
| 3  | Number of PhD enrolled  | a. Total number of PhDs enrolled in the year   | 661.000            | -            |        |  |
|  |   | b.Ratio of PhDs Enrolled to Active   | 661.000            | 564          |        |  |
|  |   | c. Total number of PhDs enrolled in S&T  | 193                | -            |        |  |
| 4  | Postgraduates Enrolment   | a.Ratio of Postgraduates to Active   | 1345.000           | 1128         |        |  |
|  |   | b.Ratio of Postgraduates Enrolled to   | 0.197              | 94           |        |  |
| 5  | Number of international   | a. Total number of international   | 451                | -            |        |  |
|  |   | b.Percentage of International  | 34%                | 34%          |        |  |
| 6  | Entry qualification at Bachelor level   | a. <b>Number</b> of postgraduate intake with CGPA >= 3.0 or equivalent for their first     | 1447               | -            |        |  |
|  |   | b. <b>Percentage</b> of postgraduate intake with CGPA >= 3.0 or equivalent for their first | 108%               | 1            |        |  |
| 7  | Total number of fellowships/grants awarded by prestigious bodies                          | a. <b>Number</b> of postgraduates via research modes (with thesis) with fellowships/grants | 400                | -            |        |  |
|  |   | b. <b>Percentage</b> of postgraduates via research modes (with thesis) with                | 30%                | 1            |        |  |
| 8  | Post-doctoral Appointments  | Number of Post-doctoral Research   |                    |              |        |  |
|  |   | a. Local   | 6                  | 6            |        |  |
|  |   | b. Foreign   | 4                  | 4            |        |  |
| <b>SECTION E: Innovation</b>                       |   |  |                    |              |        |  |
| 1  | a.Total Number of New Certificates of Patents Granted                                     | (i) National patents   | 1                  | -            |        |  |
|  |   | (ii) International patents   | 0                  | -            |        |  |
|  |   | b.Total Number of New Certificates of Patents Filed  | (i) National       | 9            | -      |  |
|  |   |  | (ii) International | 0            | -      |  |
|  |   | c.Total Number of New Inventions Granted Patents   | 1                  | 1            |        |  |
| d.Total Number of New Inventions Filed for Patents | 9   | 9  | 9                  |              |        |  |
| 2  | Commercialized products   | Total Number of Innovations Successfully Developed into Commercialized Products            | 1                  | 1            |        |  |
| 3  | Technology know-how licensing   | a.Total Number Licensed  | 1                  | 1            | 1      |  |
|  |   | b.Total Number Sold Outright   | 1                  | 1            |        |  |
| 4  | Other IPRs  | a.Total Number of Other IPRs (copyrights /   | 26                 | 22           | 26     |  |
| 5  | Starts-Up/ Spin-off Companies   | a.Total Number of Start-Up Companies (representing new businesses, jobs)                   | 0                  | -            |        |  |
| <b>SECTION F: Professional Services and Gifts</b>  |   |  |                    |              |        |  |
| 1  | Gross income from training courses (non-degree programme)/postgraduate fees with/from R&D | a.Training Courses from Non-Degree   | RM 4,000,000       | RM 4,000,000 | 894725 |  |
|  |   | b.Postgraduate Fees from Research  | RM -               | -            |        |  |
|  |   | c.Gross Income from Organising Conferences, Seminars and Knowledge-                        | RM -               | -            |        |  |
|  |   | d.Technology Know-How Licensing  | RM -               | -            |        |  |
|  |   | e.Product Commercialization  | RM -               | -            |        |  |

|   |  |  |           |              |              |     |
|---|--|--|-----------|--------------|--------------|-----|
| 2   | Gross Income Based on Financial Transaction of that Year from Consultancies (excluding Contract Research)/ Hospital Recoupable Fees/ Lab Services Fees | a.Consultancies (excluding contract research)  | RM        | 3,000,000    | RM 3,000,000 |     |
|   |  | b.Hospital Recoupable Fees   | RM        | -            | -            |     |
|   |  | c.Lab Services Fees  | RM        | -            | -            |     |
| 3   | Endowment (including professorial chairs)  | RM   | 1,000,000 | RM 1,000,000 |              |     |
| 4   | Gifts (money, equipments, research materials, etc.)(worth $\geq$ RM  | RM   | 1,000,000 | RM 1,000,000 |              |     |
| 5   | Total Amount of Operational Expenditure (OE) for R&D Development   | a.Total Operational Expenditure  | RM        | 114,616,282  | 2%           |     |
|   |  | b.Total Expenditure for R&D Development  | RM        | 4,118,815    |              |     |
| <b>SECTION G: Networking and Linkages</b> |  |  |           |              |              |     |
| 1   | Participation in International Inter-Institution Research Related Activities Under MoA   | a.Total Number of MoAs Signed and Stamped  |           | 18           | 5            | 18  |
|   |  | b.Total Number of Staff Involved in Joint Research Projects Under MoA  |           | 84           | 113          | 84  |
| 2   | Number of Staff Sent Abroad for Research Activities  | a. Total Number of Staff Sent Abroad for Research Activities   |           | 13           | 5            | 13  |
| 3   | Membership in International Academic/ Professional Bodies/ Associations/ NGOs  | a. Total Number of Staff as Members in International Academic/ Professional Bodies/ Associations   |           | 65           | 70           | 65  |
|   |  | b. Total Number of Staff Appointed as Chairman/ Committee Members in International Academic/ Professional Bodies/ Associations/ NGOs     |           | 3            | 2            | 3   |
| 4   | Participation in National Inter-Institution Research Related Activities Under MoA  | a. Total Number of MoAs Signed and Stamped   |           | 21           | 20           | 21  |
|   |  | b. Number of Staff Involved in Joint Research Projects Under MoA   |           | 45           | 30           | 45  |
| 5   | Membership in National Academic/ Professional Bodies/ Associations/ Ministry/ NGOs   | a.Total Number of Staff as Members in National Academic/ Professional Bodies/ Associations/ Ministry/ NGOs                               |           | 143          | 113          | 143 |
|   |  | b.Total Number of Staff Appointed as Chairman/ Committee Members in National Academic/ Professional Bodies/ Associations/ Ministry/ NGOs |           | 13           | 10           | 13  |

|                                       |   |  |         |            |    |
|---------------------------------------|---|--|---------|------------|----|
| 6                                     | Knowledge/<br>Technology<br>Diffusion Projects/<br>Assimilation (Social<br>Innovation)                | a.Total Number of New Community-<br>Related Projects   | 17      | 13         | 17 |
|                                       |   | b.Total Number of Rolling Community-<br>Related Projects   | 9       | 13         | 9  |
|                                       |   | c.Total Number of Communities Receiving/<br>Benefiting from the Knowledge/<br>Technology Diffusion Projects                                  | 41      | 48         | 41 |
| 7                                     | Joint Research<br>Projects Between<br>RU-Non-RUs/<br>Private Universities/<br>Industries/<br>Agencies | Number of Collaborative Projects Between<br>RUs and a Minimum of 4 Non-RUs/ Private<br>Universities/<br>Industries/ Agencies in Each Project | 8       | 5          | 8  |
| <b>SECTION H : Support Facilities</b> |   |  |         |            |    |
| 1                                     | Laboratories/<br>Research Facilities<br>that are<br>Accredited Based<br>on their Core<br>Competencies | a.Total Number of Laboratories/ Research<br>Facilities that are Accredited Based on<br>their Core Competencies                               | 1       | 1          | 0  |
| 2                                     | Library facilities  | a. Total number of titles of books   | 500,000 | 1020000.00 |    |
|                                       |   | b. Total number of online titles of books  | 500,000 |            |    |
|                                       |   | c. Total Number of Journals Subscribed   | 20,000  |            |    |