

■ General Information

Applications

- Immunohistochemistry
 - TUNEL for apoptosis
- In situ hybridization (ISH)
 - mRNA
 - miRNA
 - Fluorescent In situ hybridization (FISH)

Storage and stability

- Individual slide is put in an air-tight pack with inert gas.
- If the slides are stored at 4C, they are good for up to one year.

How processed

- Tissues were initially fixed with formalin except for some of the animal tissues
- Then, dehydrated with gradient ethanol; typically 1 hour each progressive steps; 70%, 90%, 95%, 99%, 100% x 3 times.
- Cleared by xylene, three changes for 1 hour each.
- Infiltrated with 60°C paraffin, three changes for 1 hour each
- Sectioned by microtome in 4 µm thickness

Before use

- Dry slides for 1 hour in a oven at 60C.
- Dewax slides in xylene for 4 minutes x 5 times.
- Hydrate slides in 100%, 95% and 75% ethanol for 3 minutes x 2 times each.
- Immerse slides in tap water for 5 minutes.

Slide orientation

- In most of the slides with 59 or 60 cores, the orientation is as below unless indicated otherwise. #60 location is usually filled with carbon for orientation.

| | | | | | | | | | | |
|-------------|----|----|----|----|----|----|----|----|----|----|
| Shaded area | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
| | 11 | 12 | 13 | 14 | 15 | 16 | 17 | 18 | 19 | 20 |
| | 21 | 22 | 23 | 24 | 25 | 26 | 27 | 28 | 29 | 30 |
| | 30 | 32 | 33 | 34 | 35 | 36 | 37 | 38 | 39 | 40 |
| | 41 | 42 | 43 | 44 | 45 | 46 | 47 | 48 | 49 | 50 |
| | 51 | 52 | 53 | 54 | 55 | 56 | 57 | 58 | 59 | 60 |

■ Tissue types*

The "tissue type" column in the data sheet denotes the following categories.

1. normal tissue from a non-cancer patient
2. normal tissue from a cancer patient, but the cancer involves unrelated organ
3. normal tissue adjacent to the cancer
4. benign tumor
5. tumor of borderline malignancy or uncertain malignant potential
6. cancer

NBP2-30270 - Human Larynx and Pharynx Tissue MicroArray (Cancer)

| No. | Age | Sex | Organ | Diagnosis | pTNM | Stage | Tissue type* |
|-----|-----|-----|------------------------|---|----------|-------|--------------|
| 1 | 43 | M | Larynx, pyriform sinus | squamous cell carcinoma, moderately differentiated | T4aN3M0 | IVB | 6 |
| 2 | 55 | M | Larynx, subglottic | squamous cell carcinoma, moderately differentiated | T4aN0M0 | IVA | 6 |
| 3 | 72 | M | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T3N0M0 | III | 6 |
| 4 | 63 | M | Esophagus | squamous cell carcinoma, basaloid type | T3N0M0 | III | 6 |
| 5 | 67 | M | Larynx, transglottic | squamous cell carcinoma, well differentiated | T4aN2bM0 | IVA | 6 |
| 6 | 63 | M | Larynx, pyriform sinus | squamous cell carcinoma, moderately differentiated | T3N2cM0 | IVA | 6 |
| 7 | 60 | M | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T4aN2cM0 | IVA | 6 |
| 8 | 61 | M | Larynx, glottic | squamous cell carcinoma, moderately differentiated | T4aN0M0 | IVA | 6 |
| 9 | 66 | M | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T4aN2cM0 | IVA | 6 |
| 10 | 56 | M | Larynx, glottic | squamous cell carcinoma, well differentiated | T1aN0M0 | I | 6 |
| 11 | 62 | M | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T3N2cM0 | IVA | 6 |
| 12 | 56 | M | Larynx, pyriform sinus | squamous cell carcinoma, moderately differentiated | T4aN2bM0 | IVA | 6 |
| 13 | 54 | M | Larynx, supraglottic | squamous cell carcinoma, well differentiated | T3N0M0 | III | 6 |
| 14 | 48 | M | Larynx, transglottic | squamous cell carcinoma, well differentiated | T3N0M0 | III | 6 |
| 15 | 61 | M | Larynx, supraglottic | squamous cell carcinoma, well differentiated | T3N0M0 | III | 6 |
| 16 | 66 | M | Soft tissue, neck | squamous cell carcinoma, well differentiated (from hypopharynx) | T4aN0M0 | IVA | 6 |
| 17 | 51 | M | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T4aN2cM0 | IVA | 6 |
| 18 | 46 | M | Soft tissue, neck | squamous cell carcinoma (from hypopharynx) | T3N2aM0 | IVA | 6 |
| 19 | 52 | M | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T3N0M0 | III | 6 |
| 20 | 52 | F | Nasal cavity | undifferentiated carcinoma | T4NxM0 | IVA | 6 |
| 21 | 64 | M | Larynx, transglottic | squamous cell carcinoma, basaloid type | T3N2bM0 | IVA | 6 |
| 22 | 28 | F | Lymph node | metastatic undifferentiated carcinoma (from nasopharynx) | T1N1M0 | II | 6 |
| 23 | 63 | M | Nasopharynx | undifferentiated carcinoma | TxN2M1 | IVC | 6 |
| 24 | 77 | M | Neck | undifferentiated carcinoma | TxN1M0 | . | 6 |
| 25 | 51 | M | Larynx, transglottic | squamous cell carcinoma, well differentiated | T4aN2bM0 | IVA | 6 |
| 26 | 67 | F | Neck | squamous cell carcinoma, moderately differentiated (from hypopharynx) | TxN0M0 | . | 6 |
| 27 | 59 | M | Nasal cavity | squamous cell carcinoma, poorly differentiated | T4N0M0 | IVA | 6 |
| 28 | 55 | M | Larynx, subglottic | squamous cell carcinoma, moderately differentiated | T3N0M0 | III | 6 |
| 29 | 60 | M | Larynx, transglottic | squamous cell carcinoma, well differentiated | T4aN0M0 | IVA | 6 |
| 30 | 70 | M | Oropharynx | undifferentiated carcinoma | T1N2aM0 | IVA | 6 |
| 31 | 55 | M | Hypopharynx | squamous cell carcinoma, poorly differentiated | T4aN1M0 | IVA | 6 |
| 32 | 62 | M | Larynx, pyriform sinus | squamous cell carcinoma | T3N0M0 | III | 6 |
| 33 | 48 | M | Soft tissue, neck | squamous cell carcinoma (from larynx) | T2N1M0 | III | 6 |
| 34 | 66 | M | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T4aN2bM0 | IVA | 6 |
| 35 | 58 | M | Larynx, subglottic | squamous cell carcinoma, well differentiated | T4aN0M0 | IVA | 6 |
| 36 | 76 | M | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T3N1M0 | III | 6 |
| 37 | 61 | M | Larynx, supraglottic | squamous cell carcinoma, well differentiated | T4aN2bM0 | IVA | 6 |
| 38 | 66 | M | Submandibular gland | undifferentiated carcinoma | T3N2M0 | III | 6 |
| 39 | 54 | M | Tonsil | squamous cell carcinoma, poorly differentiated | T2N2bM0 | IVA | 6 |
| 40 | 61 | M | Nose | squamous cell carcinoma, poorly differentiated | T3N0M0 | III | 6 |
| 41 | 65 | M | Larynx, glottic | squamous cell carcinoma, moderately differentiated | T3NxM1 | IVC | 6 |
| 42 | 54 | M | Skin, neck | undifferentiated carcinoma (from nasopharynx) | T4N2M0 | IVA | 6 |
| 43 | 82 | F | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T3N1M0 | III | 6 |
| 44 | 56 | M | Larynx, subglottic | squamous cell carcinoma | T4aN2bM0 | IVA | 6 |
| 45 | 75 | M | Larynx, transglottic | squamous cell carcinoma, well differentiated | T4aN0M0 | IVA | 6 |
| 46 | 69 | M | Larynx, glottic | squamous cell carcinoma, poorly differentiated | T4aN2cM0 | IVA | 6 |
| 47 | 43 | M | Larynx, subglottic | squamous cell carcinoma, moderately differentiated | T3N0M0 | III | 6 |
| 48 | 60 | M | Larynx, glottic | squamous cell carcinoma | T4aN0M0 | IVA | 6 |
| 49 | 66 | M | Larynx, supraglottic | squamous cell carcinoma, poorly differentiated | T2N0M0 | II | 6 |
| 50 | 52 | M | Larynx, supraglottic | squamous cell carcinoma | T3N1M0 | III | 6 |
| 51 | 58 | M | Larynx, pyriform sinus | squamous cell carcinoma | T4aN2cM0 | IVA | 6 |
| 52 | 47 | F | Maxilla | undifferentiated carcinoma | T1N0M0 | I | 6 |
| 53 | 65 | M | Larynx, glottic | squamous cell carcinoma, well differentiated | T4N2bM0 | IVA | 6 |
| 54 | 78 | M | Larynx, supraglottic | squamous cell carcinoma, moderately differentiated | T3N1M0 | III | 6 |
| 55 | 69 | M | Epiglottis | squamous cell carcinoma, basaloid type | T2N0M0 | II | 6 |
| 56 | 60 | M | Epiglottis | squamous cell carcinoma, moderately differentiated | T2N2cM0 | IVA | 6 |
| 57 | 46 | F | Lymph node, neck | metastatic undifferentiated carcinoma, (primary site unknown) | . | . | 6 |
| 58 | 70 | M | Larynx, glottic | squamous cell carcinoma, poorly differentiated | T4aN2cM0 | IVA | 6 |
| 59 | 79 | M | Larynx, supraglottic | squamous cell carcinoma, poorly differentiated | T3N2cM0 | IVA | 6 |
| 60 | . | . | Carbon | . | . | . | . |

TNM and Stage: AJCC Cancer Staging Manual (7th Edition)