



# Cancer Diagnosis, Digital Profiling Creations



Da-Yong Lu\* and Jin-Yu Che

School of Life Sciences, Shanghai University, Shanghai200444, PRC, China

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Corresponding author: Da-Yong Lu, School of Life Sciences, Shanghai University, Shanghai200444, PRC, China

## Abstract

Cancer is a deadly disease that leads to many therapeutic failures. Drug treatment needs diagnosis, prognosis and therapeutic information creations and promotion. To promote therapeutics, clinical diagnosis should be expanded in dimensionality and therapeutic guidance. This editorial discusses this issue of diagnosis improvements and normality (digital profiling creations).

**Keywords:** Cancer Diagnosis; Neoplasm Metastasis; Drug Treatment; Digital Profiling; Clinical Diagnosis

## Introduction

Cancer is the secondary leading mortality disease worldwide (12% of all human deaths) [1-2]. 70-90% of all cancer death is caused by neoplasm metastasis [3-6]. Cancer diagnosis needs to improve information for both growth inhibition and therapeutic guidance against cancer. To avoid further devastating incidence and human mortality of late-stage cancer, cancer diagnosis should be more informative and usefulness. This editorial discusses the landscape of cancer diagnosis in the clinic.

## Clinical Limitation

Cancer metastasis is a common feature of leading to therapeutic failure. Drug treatment needs diagnosis, prognosis and therapeutic information creations and promotion. To promote therapeutics against neoplasm metastases, clinical diagnosis should be expanded in dimensionality and therapeutic guidance. This editorial discusses the issue of digital profiling creations and basic pathogenesis revealing.

## Clinical Diagnosis

Diagnosis for cancer utilizes different platforms and systems. Treatment progresses are based on diagnosis updating and new classifications. Yet, there is little progress in clinical trials. Several common diagnostic systems are currently utilized;

- Morphological data (computerized topography or ultrasonic)
- Historic review of tumor tissues (subtypes)
- Multi-omics data for cancer
- DNA or RNA sequencing, or copy number or others
- Cancer biomarkers in plasma or elsewhere

## System Innovations

Clinical treatment evaluation and responses are based on diagnostic systems. However, current cancer diagnostic systems are not well categorized for the purpose of prognostic or therapeutic predictions. Biopsy was the common procedure for pathological and diagnostic evaluation in the past. According to this stage of techniques, more informative data of diagnostic platforms and systems should be created and optioned.

## Dimension Expansion

Today, human cancer in the clinic is termed as TNM. It only contains information about morphology, especially the status of tumor metastasis. With the rapid expansion and updating of molecular biology technology [7-14], it should be categorized as TNMH (hallmark)G(genomic)M(molecular)T(target) or other

systems to embrace new information categories and dimensions for prognostic or therapeutic applications. This should be a new trend for clinical cancer trials.

### Discussion

Tumors are subtyped to more than two hundred. Proper division or integration of clinical diagnostic data or systems has great benefits for different treatments (surgery, radio, thermos, or pharmaceutical). Due to these new integrations, further treatments will be more targeted or comprehensive, like personalized oncology [15-18], drug combination from highest number (one million) to several thousands in real clinical settings [19-22]. Drug combination commonly promotes clinical outcomes, yet mechanisms are obscure. In the past decade, several pathways and mechanisms have been proposed. Large volume of such research may be followed in upcoming decades. Including many pharmaceutical progresses, clinical cancer treatment will be disciplinary changes.

### Digitalized Pathogenesis in Future

To fulfill tumor pathological profiling, digitalized cancer information should be undergone several pathways;

- Study the possibility and sustainability of digital pathogenesis of cancer by clinical data accumulation, analysis, and innovations
- Establish potential systems of TNMHGMT or other forms alike by automatic production or formation
- Cancer pathogenesis investigations and highlights
- Establish better personalized oncology or medicine for promoting clinical cancer trials

### Conclusion

Cancer metastasis should be emphasized for patient's survival benefiting. Different profiles in genomic or molecular, like circulatory tumor cells or biomarker diagnostics and drug sensitivity testing are helpful for clinical cancer trials. Many new discoveries, methodology, and classifications could be obtained by these experimental and clinical investigations. More efficacy in cancer treatments can be achieved.

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