

The Efficacy of Hypothesis in Research in Performing Arts

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Abstract

Hypothesis is basically an assumption that is set forth prior to conducting research. Post the data collection and analysis of the same, the conclusion proves the hypothesis or throws light on another aspect of result/ research.

Typically most of the research methodology instructions received in the nascent stage of research in performing arts, point out to the importance of a hypothesis. Factors that are required for a good hypothesis are listed out.

However in actual research, it is not always necessary to set forth a hypothesis. While every hypothesis is followed by an in depth analysis and research of the data, every research activity need not necessarily have a hypothesis. The attempt in this paper is to examine the efficacy of research with and without a hypothesis being set forth.

Introduction

The term hypothesis typically conjures up images of a mathematical or a chemistry based equation followed by an elaborate justification with more equations. In a lighter vein, for researchers with a slight aversion to SEM, this can be off putting. Be that as it may, a hypothesis is crucial for any research activity. For, it is the take off point. The intent in this paper is to examine the role of hypothesis in a research activity in performing arts. It is also to

explore if the term 'hypothesis' or the 'role of hypothesis' is important. Can hypothesis be in a form other than the black and white term 'hypothesis'?

Beginnings of Hypothesis

Research is an activity in which hitherto not known facts are brought to light. It can be recording an already established fact from a fresh perspective in the light of newer developments. Or, it could also be re-searching or searching again. There are two ways in which in all the three aforementioned instances, things could have panned out as they eventually did, one could have accidentally stumbled upon facts or acted upon the gut feel of either the researcher him/herself or that of the guide.

The gut feel could be said to be the prototype of the hypothesis. A research activity is more often than not, not an aimless hunt for something or anything new. It is usually based upon a 'maybe' or 'perhaps'. Hence, one could also say that a hypothesis is a slightly concrete form of 'maybe' or 'perhaps'. When the 'maybe' or 'perhaps' is followed up upon, a hypothesis is formed, data collected, a research design or methodology finalized and in the conclusion the hypothesis proven.

Definition of Hypothesis

The Cambridge dictionary defines hypothesis as an idea or explanation for something that is based on known facts but has not yet been proved¹. A hypothesis is an assumption, idea, impression or a theory, supposition, conjecture, premise, presumption, speculation, belief, postulation, notion, proposition, theorem or a concept.²

The 'Why' of a Hypothesis

Is a hypothesis mandatory for a research or investigation? As mentioned before, every search or re-search is based on a premise that there may be something or someone, about or on which an investigation or a study or an examination of facts could be carried out. In the

¹ <https://dictionary.cambridge.org/dictionary/english/hypothesis>

² <https://www.powerthesaurus.org/hypothesis/synonyms>

initial stage, the focus may not be so sharp, but as the background research gains clarity, the basic premise gains focus, a hypothesis is formed. According to Kabir,

The word hypothesis consists of two words: Hypo + thesis = Hypothesis.

'Hypo' means tentative or subject to the verification and 'Thesis' means statement about the solution of a problem.

After the preliminary investigation to check the viability of a research problem or area, a hypothesis is formed. The various stages of research like data collection, research design and analysis are carried out keeping the hypothesis in mind. There is a direction or focus to the activities of research. The absence of a hypothesis can be likened to a rudderless boat that floats in the direction the wind blows.

How is a Hypothesis different from an Aim or Objective?

Typically in every research project, the first chapter includes the aim, scope, objective and limitation of the study. The limitation of a study is quite self-explanatory. The aim of a research activity is the point to be reached or the area to be included or covered at the end of the study. For instance, the aim of this dissertation is to analyze

- the rāga Śaṅkarābharaṇa as handled in the kṛti-s of Sadhguru Tyāgarāja, Muddusvāmi Dīkshita and Śyāmā Śāstri
- the folk dance forms of Karnāṭaka

This sets the direction of the research project. Boundary of the research project has been drawn out clearly in the aim. Aim is a clearly directed intent or purpose.³

The objective of the research activity sets forth the actions to be undertaken to reach the aim. The Cambridge dictionary defines an objective as a noun, "something that you are planning to do or achieve".⁴ For instance, the objectives, just mentioning a few as samples, for the above mentioned examples would be to;

³ <https://www.merriam-webster.com/dictionary/aim>

⁴ <https://dictionary.cambridge.org/dictionary/english/objective>

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- analyze different varieties of svara phrases
 - determine which are the jīva, nyāsa and the amśa svara-s
 - observe the varieties of gamaka-s
 - observe the svara occurrence in different kāla-s
- and;
- observe the context in which the folk dance is danced
 - observe the movements and the co-relation to music
 - observe the costumes and the 'why' of the costumes
 - examine if and how urban has influenced the in vogue form

A hypothesis is neither drawing a boundary nor listing out the possible points to be covered. It is a statement that has to be proven or disproven at the end of the study, a clear 'yes' or 'no'. There is no clear 'yes' or 'no' in either the aim or the objective.

Difference between Hypothesis and Research Question(s)

As the name suggests, a research question is in the form of a question. For instance,

- What is the difference in the handling of Śaṅkarābharaṇam by the trinity?
- It is often said that each composition of the trinity has brought to light different shades of the rāga? How so?
- Is there a change in the folk movements of a particular folk dance of Karnāṭaka?
- How has the exposure to film dance and the fact that it is also performed outside its original space affected the dance movements?

A hypothesis is in the form of a statement. Research questions are answered at the end of research. A hypothesis either stands correct or corrected.

The 'Why' of a Hypothesis for Research in Performing Arts

A hypothesis is mandatory for a research activity or investigation with reference to the performing arts?

Typically research in performing arts on one hand translates to studying and analyzing

- the history of an art form, different aspects, different facets, the techniques used, details of compositions, practitioners, pedagogy, performance practices, documentation practices, evolution, influences, developments, problems, theories, to just mention a few

while on the other, examining

- the result of applied art forms, techniques, experiments, problems, again to just mention a few

Most written guidelines for research in performing arts refer to 'identifying a research problem'⁵ leading to the formulation of a hypothesis. However, not all forays into research commence with a research problem as a basis. In many instances it is an attempt to furthering understanding or gaining knowledge.⁶ For instance, a research activity analyzing Śaṅkarābharaṇam as handled by the trinity or the folk forms of Karnāṭaka, is furthering understanding of the various aspects of both the rāga and the folk form respectively.

On the other hand, forays into research activities based on experiments, therapeutic value of art forms, physics of music, mechanics of a dancer's body, to just mention a few, take off from a well formulated hypothesis.

There are now two established areas with respect to research activity; one without a hypothesis and one with a well formulated one. Typically the areas covered in the former are historical and descriptive and in the later, experimental in nature. The presence of a hypothesis sets the path for focused research. This, could be said, is the primary role of a hypothesis – to

⁵ See for example Kabir, p.52, Durga, p.47 and Ramachandran, pp.31-32.

⁶ See article of Dr Premalatha Sharma, trans. by Rao

keep research from digressing. In the absence of a hypothesis, because of the nature of research, how is the path to research activity be set? What is the mechanism which will keep the research activity focused?

What if there is no Hypothesis?

The aim of the research activity defines the boundary and the objectives of the various stages to be traversed through to get at the aim. The research question(s) are those for which the answer is obtained through research. However there can be more than one research question. The question(s) though pertinent or related may fall outside the scope of research activity too. Again not helping in focused research.

What could play the role of a hypothesis in such cases could be the title of the research activity. For instance, a research activity carried out in an interdisciplinary area is titled “Examining Literacy Development Holistically using the Play and Learn through the Arts (PLA) Programme: A Case Study”⁷

This paper does not have a hypothesis however the purpose and a research question have been indicated clearly. The purpose of this particular research activity was to fill one of the many blanks with respect to availability of literature in research with respect to “examine the effect of the artsthrough child-led activities.”⁸ The purpose is a justification of the research activity. It is the title of the paper that clearly states the intent. The key terms being ‘examining literacy development’, ‘holistically’, ‘using play and learn programme’ and ‘a case study’. The research activity follows the path chartered by these key terms.

Another instance is an article entitled Teaching Methodology for Tānam⁹. This paper too does not verbalize a hypothesis but does point out the need for a method to teach tānam.¹⁰

⁷<https://repository.uel.ac.uk/download/500c20fa8f9ab9533a8bf4316ee111d1573565c37d2a716e7a743c5c8350ba90/280129/Theodotou%20ECDC%20-%20Case%20study.pdf>

⁸ p.5, Theodotou

⁹<https://www.dropbox.com/s/7oxwfiz3wtesk6j/AE-JayalakshmiRS-Teaching-Methodology-for-tAnam-0436.pdf?dl=0>

¹⁰ p.1, Jayalakshmi

Again the key words are in the title, 'teaching methodology' and 'tānam'. The paper follows the path chartered by the key words.

Taking the instance of another paper entitled "A Behavioral Study of Emotions in South Indian Classical Music and Its Implications in Music Recommendation Systems"¹¹. This paper clearly states the intent to test an 'old hypothesis' about rasa and rāga theory. The import being that "the traditional definition of rasas is not a proper choice in the context of music."¹² The title in this case however is an indication of the area of study. The path of the research activity is chartered by the hypothesis.

Another similar instance is the paper titled "Understanding and Classifying Cultural Music Using Melodic Features Case of Hindustani, Carnatic and Turkish Music"¹³. The hypothesis here being that "...melody is sufficient to capture the style distinction..."¹⁴ Here too the title is indicative of the area of research. The hypothesis takes care of the path of research activity.

In another instance, Sanskrit In Carnatic Music: The Songs of Muttusvāmi Dīkṣita¹⁵. Although the title of the paper is not completely indicative of the content of the paper, the intent of the paper has been clearly mentioned.¹⁶

In the paper titled "Area and Scope of Research in Music"¹⁷, The very first sentence points out to the fact that "This paper is not intended to be a textbook lesson Research in Music, as the title might suggest,"¹⁸

¹¹https://www.researchgate.net/publication/234802466_A_behavioral_study_of_emotions_in_south_indian_classical_music_and_its_implications_in_music_recommendation_systems

¹² see subheading 3, Koduri and Indurkha

¹³ <https://arxiv.org/pdf/1906.08916v1.pdf>

¹⁴ see subheading 3, Vidwans

¹⁵<https://www.dropbox.com/s/bj2zk3mba3fj7r6/AE-IndiraPeterson-Sanskrit-in-CarnaticMusic-Songs-of-MuttusvamiDikshita-0141.pdf?dl=0>

¹⁶ See Introduction, Peterson

¹⁷<https://www.dropbox.com/s/mkz0x1mk2zht9ss/AE-RamanathanN-Area-and-Scope-of-Research-in-Music-0525.pdf?dl=0>

¹⁸ see p.3 of PDF, Ramanathan

Usefulness of 'Limitations' of the Research Activity

Typically the first chapter of a thesis or the introduction to the paper also clarifies what the research activity is limited to. For instance, the master's dissertation, "The Signal Contribution of Guru Śri. M. V. Narasimhācāri to Dance"¹⁹The title does set the intent of the research activity but the 'limitations' clarifies the path of the research activity. An indication that there are portions which are not included in this present research activity.

Since much of his work has been in the pre-internet era, sources and memories are relied on to gain an understanding of Narasimhācāri and his contributions to music and dance. Additionally, a comprehensive list of the compositions of M V Narasimhācāri has not been possible here in the MFA dissertation.²⁰

Hypothesis Mandatory Only For A Thesis Or A Research Paper Too?

The difference between a thesis or a dissertation and a research paper, it can be said, is only in terms of the magnitude of scope. It is typically more for a thesis and on the lower side for a research paper. Correspondingly, a thesis is of either sixty to two hundred and fifty pages, while a paper is usually ten to fifteen pages long. The intensity or the intent remains the same. The need for a focused approach is no different.

Conclusion

Akin to the fact that a research activity is not an arbitrary exploration or investigation, the setting up of a hypothesis or finalizing the title of a research activity too is not an arbitrary one. Though postulating a hypothesis works for certain genres of research activity, it does not for some others. In such instances more than the name for the term hypothesis, the role essayed by hypothesis is to be considered. The title of a research activity with help from

¹⁹ This is an unpublished Master of Arts dissertation by Lakshman submitted to the Directorate of Distance Education, Tamil University.

²⁰ p.4, Lakshman

limitation of the same can be said to 'fill-in' the role of the hypothesis. In instances of the title indicating the area of research, the indication of the intent plays the role of a hypothesis.

The importance of the role of hypothesis in a research activity cannot be questioned, but the form of a hypothesis can be different depending on the genre of the research activity.

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