



# My new best friend: AI

**By Mr.Nilanjan Mondal – MBAEx Class of 2017**

I almost named my daughter AI! I was torn between AI and GPT (inspired by Elon Musk's X Æ A XII but lacked the creativity that he possesses).

The wife threatened to leave (along with the baby) unless I gave up on the idea, and I had to concede. In hindsight, I think she wasn't wrong! On most occasions, she isn't!

But, in my defence - imagine this -

A GGP equivalent party in Silicon Valley, a splendid evening of grandeur, with a resplendent attendance of all the latest technologies and applications who are proudly contributing to make the world a more predictable, uniform and automated place, or, in other words a "significantly better tomorrow". With sumptuous starters of the latest IC chips, followed by an eclectic main course of impressive processing prowess, technologies are indulging in mirth and merry making! The downtempo beats of the lo-fi music are only adding to the charm of the evening. The icons of yesteryears are smiling at the dashing youthful arrogance of the heartthrobs of today. Moore's Law, a regular in these parties who has always enjoyed attention, is found simping over edge computing.

And suddenly, the lights are dimmed. The star-studded room is slightly taken aback. The music gradually fades into a distant din. Slowly the central staircase is lit up by a spotlight, not very sharp but with slightly

softer edges. The technologies strain their eyes hard to see if the drama is worth the entrance. A pregnant silence grips the room. There is anticipation, and there are bruised egos already!

And slowly, as if descending from the parted gates of heaven, you have AI, the coolest thing ever, sashaying down the grand staircase, shrouded in an intricately woven cape of enigma. The technologies wait with bated breath.

AI, the cynosure of all eyes in the party, glides around the ballroom barely disclosing any preference for a specific technology in the room to partner with.

The technologies and applications have given up on restraint and have now started showing desperation to pair up with AI for just one dance, called the "Dance of Relevance".

Someone in the room whispered, "Once AI touches you, you transform to become immortal"

Now, tell me, am I too off, when I say that I have been drawn into the magical realms that AI promises?

Of course I am not the only one enchanted by this enigma - you do remember what happened that evening at the party of technologies, right?

In case you need more proof - between June 2022 and March 2023, the search volume for the term "AI" has almost quadrupled from 7.9 million searches to 30.4 million searches per month (according to Statista).

So, who is this AI?

AI, or Artificial Intelligence is a field within Computer Science which enables machines to act like humans in making decisions. This is made possible by enabling the system to ingest large amounts of data, process it, recognize patterns, draw insights, and make predictions based on the statistical probability derived from the ingested data. This explanation, by no means, should be considered a literary description of AI and its capabilities. This is just a very broad based, dumbed down attempt of ensuring a common starting plane for what is to follow.

As you can imagine, there are innumerable aspects in our lives that are touched by AI. Starting from auto-completion of sentences in emails and auto-corrects in our phones to managing risk profiles and detecting frauds in fintech, across manufacturing, and even agriculture.

In fact, the list of aspects that are not touched by AI will be easier and shorter to create, if it does exist at all.

Let us try and explore the various shapes and forms that AI takes. Very broadly speaking, AI can be roughly categorised into 4 areas -

**Reactive AI** - Reactive AI algorithms operate on present data, using statistical maths, considering huge chunks of data to produce an intelligent output. It is limited in its capabilities in using previous experiences to inform present and future actions. Recommendation engines and automated filters are 2 areas of applications where reactive AI is most used today.

**Limited memory machines** - Based on our understanding of how the human brain works, this algorithm has been developed to imitate the way the neurons in our brains connect. This is deep learning, and the most interesting part of this algorithm is the way it can improve through a continual process of training on more data. Pattern recognition is an area that this algorithm finds most applications and excels in, besides being used in chatbots,-

virtual assistants and language learning models.

**Theory of Mind** - This is a term derived from psychology. This refers to a machine's ability to attribute mental states, such as beliefs, intent, and emotions to other entities. While this capability will have deeper and far reaching applications, we are yet to see AIs delivering reliable results in this realm.

**Self aware AI** - This clearly belongs to the highest echelons of evolution in this field, where a machine becomes conscious of its own emotions, beliefs, and state of being as well as of the other entities'. Needless to say we are yet to significantly start exploring this space

**Now a quick look at what AI doesn't feel the most comfortable doing -**

**Delivering consistent and reliable interpretability** - AI models are generally trained to group data together and arrive at outcomes on the basis of probabilities. This leads AI models to reach outcomes based on correlation rather than on causality.

**Misguided output** - The quality of output of a model is heavily dependent on the quality of data used to train the model. At present there is barely any governance that ensures that the data used is verified and of high quality. This has led to outputs having questionable accuracy, thus rendering it non-actionable, or actionable in a limited remit.

**Amplified biases** - Historical data is replete with existing socio-cultural biases. A model learning from such data ends up not only inheriting the bias but also amplifying it. This amplified bias is then proliferated across the multiple layers of the ecosystem. This demands a high vigilance to ensure diverse and authentic data is used to train models to minimize subconscious and unconscious bias.

Now, I am not officially trained in AI nor do I lead engineering teams that pioneer in creating applications using AI. Then what authority do I have to talk to you about the subject?

Well, I speak using the authority that comes from being an active participant in a connected world where AI is my co global-citizen.

Even if you live in a cave, you already know by now that AI is the new sunlight, given that its presence and influence is as expansive as that of the sun!

So, to sidestep the risk of sounding generic, from hereon I will restrict myself within the realms of AI in digital advertising - as this is the space that I am deeply entrenched in, in my professional life.

Digital advertising is slowly turning into a beautiful paradoxical world as this is one of the fastest evolving landscapes, poised at the tip on cutting edge computation, and at the same time, is in dire need of relevant policies and regulations, which is probably the slowest moving aspect whether in business or in governance.

Now, I can go into the obvious territory of describing how AI enables the creation of persuasive content that allows brands to personalize at scale, resulting in multifold increase in brand loyalties. Or, I can mention how AI sifts through terabytes of data to create aggregated consumer personas for effective targeting. Or, maybe we can delve deep into the way AI operates an automated real-time bidding algorithm within a fraction of a millisecond using deeply embedded psychographic signals at the cross-section of interests, affinities, demographics and life events. But all of these are realities today, and what is the fun in discussing something that is conspicuously glaring at us?!

Instead I want to talk about areas that AI is yet to fully exert its influence on. Because through that, I intend to address a palpable discomfort that all minds and -

discussion rooms are abuzz with. And that is -

### **With the world in AI's grasp today, how do I (as in, the human) stay relevant?**

I will start with the impact that AI can have in regulation and policy making in the field of digital advertising. But the same can be extrapolated to other areas of governance as well.

The following is a list of outcomes that we can strive to achieve, partnering with AI -

#### **Create policies led by values and goals instead of facts and historical evidence**

We, humans, can never beat a machine in ingesting and computing data, or in organising and referring to collected samples of filed evidence or facts.

Instead we can define goals, and boundary conditions based on socially and culturally relevant values. With this as the "what", machines can optimise towards creating the best version of "how".

#### **Organisational silos can potentially become folklores of history**

Humans are limited in their capability of usefully processing data that is voluminous and widely diverse. Sometimes silos exist in organisations, while at other times silos are created to retain relevance, thus paralysing effective policy making.

With the advent of AI, and its ability to recognize patterns and make recommendations, information will be democratised. This will allow visibility into relevant pieces for effective and holistic policy making

#### **Decentralised decision making with centralised access to data**

Data collection, sorting, organisation and housing can become centralised. With access to the same data pool, a parity and transparency in knowledge can be ascertained across the board. With pre-defined goals and guidelines, decision making can now become decentralised on the basis of a uniformly accessible data pool. This reduces the gestational period for policy making by eliminating bureaucracy, and helps

build an execution focused culture.

### **Adapt in real-time**

For new policies to be created, or existing ones to be amended, there are multiple complex steps that are involved. Observation, data collection, gathering statistically significant evidence to challenge status quo, acknowledgement from involved parties, defining new guidelines that are inclusive and balanced in incentives for consumers and enterprises, ensuring correct infrastructure for execution, on-field execution, and governance - just to name a few. Now, all of these steps are excruciatingly demanding in terms of time, resources and precision, thus resulting in significant lags and delays. This often renders a policy redundant or ineffective. AI can enable a bulk of these steps in real-time through its ability to generate insights from pattern recognition, among many, and significantly impact the effectiveness of policies and govern execution.

Well, that sounds bright and hopeful, but the question still remains, in our journey towards this transformed world, how do we continue to be relevant?

Now here is where I start to theorise, and run the risk of sounding somewhat old and boring. And, that is precisely why I am happy to leave this section open for as much collaboration and editing as possible.

From my lived professional experience in the ever changing landscape of digital advertising, here is a list of 6 items that I try to pursue. Now all of these approaches are not unique to a world propelled by AI, but these are a relevant reminder at this stage for sure.

1. The list starts with being **Hungry!** I don't mean the hunger that leads you to being a glutton but rather in spirit. We've all been overexposed to the over-used phrase of "Stay hungry, stay foolish". Yes, this is a recall of that. AI is here today, and you can't just will it away in your quest to stay relevant. We need to dive into this. Not all of us are equally -

equipped to grasp all aspects here, but the stronger the hunger the better will be the identification of the areas that pertain to our areas of work. Imagine!

2. Be **Unabashed** - about exploring areas in your sphere that can benefit from partnering with AI. While doing this, we may come across as outrageous in challenging the status quo, or may even be taunted for letting ourselves follow the "hype". But being unabashed in our quest to explore areas of partnership will hold us in good stead.

3. We need to be intentionally **Meticulous**. This is something that is quintessentially applicable across all aspects in life - personal and professional, but does merit a mention nevertheless. With the advent of AI across almost all aspects of life, there is a seismic shift in expectation for consistent high quality. Consistency in delivering high quality used to be a differentiator for products and brands, but this is slowly becoming a hygiene parameter across industries. This demands a mindset shift in terms of holding ourselves accountable to consistently delivering high quality, thoroughness, and precision. AI delivers on the basis of ingested data, patterns and historical events. Being meticulous will enable us to identify deviations or variations from repetitive historical occurrences, thus enabling us to add quantifiable value to the ecosystem.

4. Be an **Amateur!** Or, in other words, we need to hold on to that 20-something self of ours who is secure in acknowledging that there are more things that we do not know than the things that we do. With growing exposure and experience, more often than not, we trap ourselves into the perception of being an expert. But a static expert is way less valuable than a dynamic amateur. All of us will have different starting points as we begin to partner with AI. An amateur mindset will empower us to absorb effectively and efficiently.

5. Be **Nimble!** This is an organic progression once we are comfortable in being an amateur. Having liberated ourselves from the self-

imposed burden of being an expert, we need to be nimble, and be a generalist or a specialist as per the requirements of the ecosystem. A casual internet search will throw up an umpteen number of articles on who you should be - generalist or a specialist - in today's world.

AI powered machines trained extensively on a specific kind of data, will always be a far better specialist than a human can ever be, in delivering near perfect outcomes. With this as the frame of reference, you will be able to add value by being a generalist, as an AI generated outcome needs to be juxtaposed against the broader context.

But for an AI model to be trained on relevant marketing data, performance metrics, quantifiable customer insights, and business goals that are aligned with macroeconomic conditions, you need to be a specialist with quality experience in the field of digital advertising.

So, irrespective of which article you read on the internet, be absolutely light-footed to switch from being an amateur to a mentor.

6. Keep **Evolving!** AI is one of the many monumental technologies that have been created in the past 100 years. The reason why AI is different is because this technology enables the algorithm to learn and improve with exposure to more relevant data. Value creation lies in evolving. There are innumerable cases of mega enterprises that once ruled the roost in their respective industries, running aground. And, the common thread that ties all those occurrences is that of a failure to evolve. The speed at which AI is proliferating across applications across the board will soon become the benchmark for change.

These are all areas where AI is significantly lagging behind us. There is no harm in building on a lead that we already have!

The value of being a human lies in being imperfect. But it is important to earn the right to be imperfect, by striving to evolve and by willing to take risks.

The human aspects cannot be encompassed within the realm of a binary "right" or "wrong". There are different versions of "right". And maybe one of those versions is best suited in a situation, but that again is determined by the real time emotional response of the recipient. And, this emotional response or reception of your audience may not be explicitly mentioned but may be subliminally expressed. But unless this is entered into a processor actively as an input, even a super intelligent AI might perform sub optimally.

AI is a threat only if we compete with it. The objective should not be to rely on areas that machines deliver imperfectly on, because those areas will stop being a reality soon.

This is not a unique perspective on thriving in an AI powered world, and for all you know, this might be irrelevant in a couple of years from now. But that is exactly the point - algorithms do not have the liberty to be wrong and still be relevant, but we do - as long as we - are hungry to learn, unabashed in our quest for exploration, meticulous in our work ethic, adaptable in our approach, nimble in our responses, and keep evolving! Or in other words, as long as we strive to be more humane in our ways!

You didn't see that coming, did you?!



## Nilanjan Mandal

### TIKTOK, IIM CALCUTTA

Nilanjan is a keen learner who has been across healthcare and adtech industries through the lenses of product marketing and product management.

