The Day After Tomorrow in Bengaluru: Environment, Global Climate Change and Dystopia(s)

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Everybody's got cancer nowadays in town. I have a week more to live according to my astrologer, so luckily, you got here before my untimely demise.

(O'Yeah 2018)

Tomorrow, there will be consequences. Today, there is hope.

(Lakshminarayan 2020)

Our planet is dying – and our fictional futures with it.

As of 2020+, the Global South is ravaged by apocalypses waiting in the shadows; its notional and tangible spaces reel under an onslaught of present (e.g. environmental degradation) and future threats (e.g. ecological disasters); and it becomes one site where 'real' (climatic) phenomena fuse with 'speculative' (literary/cinematic) manifestations that reorient contemporary reality. As techno-scientific tsunamis of metaphorical dimensionalities pummel our world, our popular imagination gets lacerated by 'eco-dystopias' and ecological catastrophes. In a world already taxed by excessive pollution, bourgeoning population, acute

depletion of resources, exploitative systems of governance (and modes of production) etc., the visible socio-political fault-lines gain prominence – 'identities' come even more alive.

There is nothing permanent except (global climate) change. This global climate change (GCC) emanates from – and precipitates – interlocking epistemes of science, technology, economics, environment, ecology, ethics, culture, etc., and contours humanity's engagement with itself and the planet it inhabits. No wonder this 'change' has been the subject of rigorous academic scrutiny: GCC's intersections with 'ethical responses' (see O'Hara and Abelsohn 2011), 'economics' (see Stern 2008), 'geopolitics' (see Hommel and Murphy 2012), 'global governance' (see Saran 2009) and ecology (see Stableford 2005) bear testimony to its rhizomatic, *gestalten* being.

Zooming in further amplifies our problems: global cartographic projections, market forces – and national counterpoints – emerge. GCC becomes a thorny issue for India, especially since the nation 'does not want any constraints on its development prospects' but also aspires to be 'seen as an emerging global power that requires a leadership role on key global issues like climate change' (Kapur et al 2009). Balancing the two demands becomes a difficult act for a nation struggling with climatic actors. As I argue elsewhere: many regions are routinely flooded during the monsoons; the NITI Aayog predicts 'severe water scarcity for hundreds of millions of people' in India by 2030; and 'air pollution is now the third-highest cause of death among all health risks (CSE)' – there is a clear reason why '*2012* (2009) begins at the fictional Naga Deng Copper Mine, and *The Day After Tomorrow* (2004) premiers with a UN conference on global warming in Delhi' (*Star Warriors* 196).

Dori Griffin argues that 'within the last five years, several authors have suggested that speculative disaster fiction is a symptom of troubled times; near-future dystopias proliferate when the present seems particularly grim (Heffernan 2015; Hughes 2013; Määttä 2015)'

(Griffin 2019). The material realities of such 'zero world(s)' are bound to influence India's cultural production, too – notably its Speculative Fiction, which encodes environmental and socio-political concerns. To cite three examples of short stories from Bangla, Marathi and English: J.C. Bose's 'Palatak Toofan' (1921), Jayant Narlikar's 'Ice Age Cometh' (1993), and Kenneth Doyle's 'Rain' (1993) foreground, inter alia, environmental degradation. Moreover, GCC is bound to reify dystopian polities in its wake; literary representations, consequently, fuse ecological catastrophes with socio-economic disparities with élan. To cite examples from recent novel, (short) films and short story: Prayaag Akbar's *Leila* (2017) projects an India of the near future where the groundwater has almost dropped to nil (88); *Carbon* (2017) projects a Delhi NCR of 2067 AD as a soot-ridden shell of its former glory; *Hope* (2017) is set in a dark, post-apocalyptic future which faces an acute shortage of resources and energy; and Manjula Padmanabhan's 'Sharing Air' (2004) is set when/where the atmosphere has become so thin that stars often 'show in the daylight' (89).

These eco-dystopias become about *our today*. Sakshi Dogra and Shweta Khilnani note that while Amitav Ghosh 'views the merger' of SF and Climate Fiction as an 'ethical violation' as the alternate/future settings of SF negate the 'nowness' of the challenge, however, Vandana Singh believes the 'novum' as fundamentally imbricated in our times – which generates a 'significant engagement with the present-day' rather than postponing the issues at hand (*Imagining World, Mapping Possibilities* 117). This chapter tilts towards Singh's assessment – and pursues its objective via (loosely) playing with (Trexler's) eco-dystopias and (Moylan's) critical utopias. Griffin finds eco-dystopia as emerging from 'utopic literary tradition' where '*utopias* offer fictional times or places that are unchangingly perfect'; '*anti-utopias* show an elsewhere or elsewhen that is nihilistic and without the possibility of change'; and '*critical dystopias* function as "anticipatory machines" and tools of transformative critique, warning of the possible future consequences of present actions (Moylan 2000, 160–99)'; these critical

dystopias 'suggest strategies for resistance or change and offer the hope that action is not useless (Elphick 2014, 171; Sisk 1997, 6; Stillman 2003, 15)' (Griffin 2019). Hollie Johnson notes that 'eco' for Trexler can be about our 'oîkos', our home/household, that is, a 'space/place/time of dwelling'; about our 'economy', referring to 'the material circumstances of everyday life and social relationships'; and about our 'ecology', including 'environmental factors, such as geography and climate, in shaping the dystopian society' (Johnson 2019).

The intersection of home, economy and ecology, especially vis-à-vis emergent technologies, future projections, and unequal societies, that too in order to spur the present reader to urgent remedial intervention, is often explored by Science Fiction (SF) – justifying this chapter's choice of this particular genre/mode. It then selects a spatio-temporal location (India/2020) and a specific format and language (short story in English) to interrogate how eco-dystopias are structures and operationalised.[1] Now, Samuel Delany finds SF to be a narrative convention that employs the 'future' to present distortions of the 'present' (quoted in *Seven Beauties* 78). For contemporary Anglophonic SF in India, the city becomes a contested space as its narratives extrapolate (and interrogate) past(s) and future(s). One can mention three metropolitan cities in India's recent SF: the Mumbai of Varun T. Mathew's *The Black Dwarves of the Good Little Bay* (2019) projects an 'invasion of the sea' owing to the 'melting of the

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[1] Now, this chapter is aware of how climate change narratives are no longer speculative – and focuses on their mimetic components to assess how the epistemic frameworks of GCC and dystopia fuse in literary representations of a major Indian city, especially those published during the last couple of years. It neither delves into the history of climate change narratives in India, nor into the Science Fiction versus Climate Fiction versus Dystopia debate. Rather, it fuses all three to view how these literary visions of tomorrow can act as harbingers of better (lived) tomorrows.

polar ice caps and the rise of ocean levels across the globe' in the country's near future; it also attributes severe atmospheric changes in Mumbai to 'decades of environmental degradation and the chemical reconfigurations' (Mathew 2019). Set in 2089 AD, Anil Menon's 'Shit Flower' (2019) traces overpopulation by ascertaining how 'twenty million people, and at least as many non-people, can and will produce an ocean' worth of biosolids on a daily basis' (Menon 2019).

Kolkata, too, finds its futures selves subversive: if Ruchir Joshi's *The Last Jet-Engine Laugh* (2001) makes the city brave a water crisis in 2030 AD, then Vandana Singh's 'With Fate Conspire' (2019) drowns the city, as 'the river overflowed…sea came over the land'; cities across the world share the same fate, since 'everywhere cities are flooded or consumed by fire. Everything is dying'. A parched, dystopian Delhi is in the middle of a post-CBRN warfare reconstruction in Shovon Chowdhury's *The Competent Authority* (2013) – and the capital city is plagued by a water crisis, hazardous air quality, gated communities, and a surveillance state in Samit Basu's *Chosen Spirits* (2012).

This chapter, however, focusses on representations of a fourth city, one central to a neo-liberal, globalised India's 'technical' and 'capitalist' imagination; it studies the portrayal(s) of Bengaluru, the silicon valley of India, and maps its fictional futures via an environment/dystopia *dispositif* when placed within a post-colonial matrix. The choice of this city is again intentional. TG Shenoy finds that the 'fictional futures' of Bengaluru occupy a unique place in India's popular imagination: 'Delhi is power, Mumbai is money and glamour, but Bengaluru is technology, though it is as much about art and history, a cosmopolitan city that refuses to be tied down' by 'regionalism or parochialism'; it is, in essence, 'futuristic while being rooted in the past'. Now, even this city appears in Elizabeth Bear's novella *In the House of Aryaman, a Lonely Signal Burns* (2012) – a murder mystery set in a Bengaluru of the future – and in Shalini Srinivasan's 'Road: A Fairy Tale' (2019) – which Shenoy finds to be about

'urban decay' and 'environmental degradation' in Bengaluru since 'the Road is Sampige Road and Sludge is the Vrishabhavathi' (email).

This chapter adopts the novum to interrogate the eco-dystopias of/in Bengaluru which have been published in the last three years (2018-2020). The novum is 'a scientifically plausible innovation that catalyses an imaginary historical transformation' (Csicsery-Ronay Jr., *A Companion to Science Fiction* 2005), and when viewed in the light of the assertion that 'ecological issues are situated at a complex intersection of politics, economy, technology and culture' (Heise 2006), acts a node through which cultural, ecological, environmental and socio-political etc. projections of/onto Bengaluru can *excavate* extrapolations.[2] These three stories – 'Microbiota', 'Bluru' and 'The Ten-Percent Thief' – manifest three diverging nodes of how India's contemporary Anglophonic Fiction engages with eco-dystopias – which, not only project 'failed sociopolitical structures' but also futures where 'the environment has been damaged, perhaps irreparably – usually by human population growth, pollution, new technologies, and the unchecked cycle of production and consumption' (Griffin 2019).

Love, Lies and CRISPR: 'Microbiota and the Masses: A Love Story'

SB Divya's 'Microbiota' features 'a sickly biologist' who has 'shut herself off from the world and its deadly pollutants to research her beloved microbiota in peace – until a chance encounter drives her to venture out into an unliveable Bengaluru' (Divya 2019). Moena Sivaram is a

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[2] Though eco-dystopias generally do not focus 'on a *single* cataclysmic event triggered by nuclear disasters…but on the consequences of everyday human behaviors enacted repeatedly over protracted periods of time' (Griffin 2019; emphasis added), this chapter still utilises the novum to identify how disruptions in India's future evolve out of a play between the semantics/syntax of SF/Climate Fiction/Dystopia in order to indict the present.

genius researcher who has isolated herself for the past five years. She rarely steps out and her limited encounters with the outside world are necessitated by a desire to keep her immediate (artificial) environment sanitised. Her 'friends' and 'children', thus, are the flora, bacteria and biomes that surround her – and exist within her.

Moena's bubble is burst when Rahul Madhavan, a field applications engineer, drops by to conduct repairs of a faulty 'SmartWindow', and the recluse finds herself falling for an (metaphorical) 'outsider'. Against her better judgement (and the alarmed advice of a friend, Professor Das) Moena applies for internship at Hariharan Ecological Group (HEG) to meet Rahul again – which she manages to, albeit under a false identity. During this meet, Rahul launches into an ardent speech on 'water pollution, remediation, plant and bacterial seeding' and Moena feels her academic, insular approach to research being swayed by Rahul's hands-on engagement with 'community effort and citizen science, of working with the earth and not against it'.

According to Bodhisattva Chattopadhyay, a lot of SF produced over 'the past two decades concerns climate change, population growth and technological developments'; he adds that SF 'authors do not try to predict what society will be like; rather, they extend the tendencies they see here and now into the future' ('Science Fiction'). Moena – as Meena – develops her own vision of the future as she volunteers for the HEG and is tasked with 'collecting soil and water samples for analysis' from Agara Lake, which is 'rife with industrial metals, plastics, and animal waste'. When she steps out and draws 'her first breath of raw city air in five years', she notices the dust in the air, the 'black exhaust' spewed by diesel trucks, and the 'decaying refuse and putrid sewage' which makes her gag. The banks of the lake are slime-ridden and 'white-foam' floats in 'Rorschach' blotches – and make Moena wonder how the 'state of the world had got so rotten'.

As Moena falls deeper in her research – and in love with Rahul – she also finds newer ideas and specimens to make Bengaluru better. She had written a thesis on 'fresh water bioremediation' and now intends to use her skill-set for the betterment of a local lake. However, these foreign bacteria infiltrate her 'cultivated sanctum' one day – and attack Moena's body, which responds with skin rashes, a runny rose, and headaches. Galvanised into action, Moena utilises CRISPR technology to engineer bacteria that become 'oxygen-devouring microbeasts' that attack plastics; she finds a way to 'improve the breakdown of the polycarbonates' using enzyme sequences from a fungus (*Geotrichum candidum*, which is a member of the human microbiome) and by splicing it with a gram-negative bacteria (*flavobacterium*). She decants 'half of her custom bacterial solution into a sterile test tube' and gets ready to take a leap of faith. If novum is that 'historical innovation or novelty in an SF text from which the most important distinctions between the world of the tale from the world of the reader stem' (Csicsery-Ronay, Jr., in *The Cambridge Companion to Science Fiction* 2005), then this splicing becomes the novum – which then leads to a transformation. There are also other contenders such the SmartWindows but the efficacious CRISPR-based gene editor and its solution look more promising. When dumped into the Agara Lake (the other half she uses on her home), the 'single-celled lovelies' manage to 'digest the iron and polycarbonates in the water', and 'then make their way into the locals' – this may lead to a cascade effect that would soon infect the 'sewage runoff and restore the water to liveable purity'. Interestingly, while SF is full of horror stories that start right here, this particular experiment succeeds. Moena records her findings in a paper, which are also corroborated independently by Rahul: he has the 'HEG do the lab analysis' on samples from the lake and the results are promising. The story ends with Moena/Meena and Rahul getting comfortable with their real identities and bonding over how they want to change the world. Rahul moves in with Moena and is welcomed 'home'. Tomorrow can be better – if we work towards it.

While 'a kind of GM rice' originally meant to 'combat global malnutrition and hunger' in Rajat Chaudhuri's *The Butterfly Effect* 'takes over ecosystems' and 'causes death, ageing and forgetfulness in humans' (*Star Warriors* 156), Moena's unleashing an 'unverified, unpublished' treatment for the city's ecosystem does more good than harm. SB Divya, when asked about CRISPR, and whether the exigencies of a love story forced a happy ending that deviated from the more commonly-used strain of 'warning SF', replies that she finds genetic engineering to be a 'tool' that 'has the potential to do as much good as harm and has already done some of both'; she adds that she 'prefer[s] to write realistic depictions of the future with a healthy dose of optimism', and she 'specifically wanted to demonstrate that we have people working today in environmental remediation using bacteria' (email 2021).

The home is safe – so is the economy and ecology. Rather than being reified, class, too, is transcended with Rahul and Moena – perhaps an extension of Divya's claim that she does not see a Bengaluru of the near future 'falling into a political dystopia any time soon' though the environmental concerns of pollution and climate change are likely to get worse without immediate remedial action (email). However, the next story manifests another node of the eco-dystopian imagination: home may be (relatively) safe but the economy and ecology slowly begin to bear the brunt of *vikas*.

Incredible India: Satire, Surveillance and Hybridity in 'Bluru'

Zac O'Yeah's satirical 'Bluru' is set in a dystopian Bengaluru (often shortened to Bluru). Fusing concerns of GCC, overpopulation, pollution, caste and class conflicts, etc., 'Bluru' focusses on Herman Barsk, a former Swedish police officer, who visits Bengaluru along with his Indian wife, Kumkum, for a week-long holiday. Barsk exits the Bluru airport, which is 'guarded by heavily armed soldiers behind sandbags' – as if to manifest an existential threat to the state – and then proceeds to spray himself with an 'anti-sunshine gel' (O'Yeah 2018). The

city itself is an environmental wreck: 'the sun never shines' as hazardous levels of 'vehicular pollution' blocks the sun; 'smoggy fog' hangs so low one could touch it; this also prevents raindrops from reaching the surface, and precipitates a shortage of clean air and water. 'The micro-waved air' feels like 'sucking at the exhaust of a garbage truck', forcing one to 'chew' and spit out 'the airborne crud' before 'swallowing the oxygen into your lungs'.

Suparno Banerjee argues that 'the exploitative nature of capitalist and neo-colonial forces is also often expressed through the tropes of natural disasters'; he continues on how 'estranging devices of futurity' are utilised to reflect the 'ideologies of the present' and 'political, economic and environmental hopes and anxieties' – this also leads to these futures evolving their own mechanics of operation between India and the West, a stage where hybridity and synthesis are most common (121). Such hybridity is manifested more clearly after the couple is met by Hari Majestic (a detective from O'Yeah's oeuvre): anold acquaintance Barsk was trying to reach. Hari's assistant electronicappaswamy had hacked into Barsk's itinerary and prompted Hari to welcome the couple to India. After an exchange of pleasantries, the trio decides to dine in Gandhi-Nagar: 'lunch-time is still on'. However, reaching there appears to be a problem: the infamous Bengaluru traffic finds itself indicted in a comic extrapolation. While 'thousands of taxi drivers' stand with their vehicles – some 'over 200 years old', occupying the road as 'medieval ruins' – outside the airport, there has been a gridlock in the city centre for over two decades now; the road leading to the city centre is such that 'people have been living in their cars, getting married, having kids' (reminiscent of *Doctor Who*'s 'Gridlock').

Sophia David avers that 'climate change sits outside inherited modes of thinking' as it 'renders previous modes for defining these as obsolete' and makes one 'rethink *a priori* knowledge, terms and habits' (265). Since the trio cannot travel via road, and any other mode of public transport seems unavailable, they decide to 'levitate' to their destination using yogic

techniques. Interestingly, the yogic levitation rails are 'Made in China' – hybridization at work again. As Barsk moves towards his lunch rendezvous, he sees 'fly-unders and fly-overs and fly-betweens crammed with cars, buses, cows, elephants, monkeys, demonstrations, riots, and what to him looked like civil wars judging by the sounds of booming bazookas and nozzle flares he could make out through the haze'. The story ends in the middle of this sojourn – just as Barsk has a profound (orientalist?) realization about the country he is visiting. Tomorrow isn't really better – thus, we must work towards it.

This satirical take on climate change, hazardous air quality, overpopulation, traffic and pollution etc. projects a dystopian Bengaluru in a state of stochastic chaos. As Johnson avers, 'the ecodystopian novel [and the short story by extension] does not simply use a post-apocalyptic of environmentally-ravaged setting as a backdrop' as it also focusses on the 'consequences of this environmental precarity' as 'central to the functioning of the dystopian society and central to the narrative' (Johnson 2019). While environmental degradation in Bengaluru and shortage of resources – and space – forms the butt of the critique, the story simultaneously refracts socio-political concerns that plague contemporary India. From global terror (the airport is guarded by 'armed soldiers being sandbags') to caste (Barsk's wife comes from an 'upper-caste family and was always right'), one can see the tongue-in-cheek linkages that mirror current realities.

Class finds its own presence: the 'rich have already evacuated' to the 'cool moon', which promises 'chill-out clubhouses, freezing-cold gym…and free ice cubes'. Luna has been terraformed and the powerful are attracted towards 'look[ing] down on the rest of the world'; this becomes the novum, especially as a 'rationally explicable material phenomenon, the result of an invention or discovery, whose unexpected appearance elicits a wholesome change in the perception of reality' (*Seven Beauties* 6). Moreover, the smog that has become metaphorically 'reified' can give this novum competition, pursuant to Banerjee's take on synthesis. After all,

'climate change asks for authorial innovation, demanding plotlines and characterizations that participate in the global, networked, and controversial nature of climate change' (Trexler, Johns-Putra 2011). The economic instabilities also appear in this future after 'a spate of demonetizations' – a clear reference to India's 2016 demonetization that rendered 86% of currency useless (see Tharoor 2017).

A critique of the AI and surveillance state also creeps in: Barsk's credit card is shredded by an ATM machine since its 'sentiments' have been hurt (in an age of hurt sentiments and lynched bodies). Barsk has also not filed his KYC (know-your-customer) paperwork: without a valid social security number (he might be an illegal immigrant, after all!), he is neither able to withdraw money nor make telephone calls (divesting him of his purchasing power *and* his ability to communicate). With hints of Shovon Chowdhury's inimitable *The Competent Authority* (2013), this is another satire that cuts deep – and not just (as) an eco-dystopia. The next (last) story presents disruptions of home, economy and ecology alike. Have we arrived at the point of no return?

Resistance is Natural: Crossing the Carnatic Meridian in 'The Ten-Percent Thief'

Multi/transnational corporations – be they of the 'Umbrella' kind (*Resident Evil*), the 'Weyland-Yutani' kind (*Alien*), the 'LexCorp' kind (*Superman*) or the 'Tyrell' kind (*Blade Runner*) – are often primary antagonists in a lot of SF. Lavanya Lakshminarayan's 'The Ten-Percent Thief' adds another name to the table: Bell Corporation.

The story is set in Apex City that exists across a 'crater that was once Bengaluru' (Lakshminarayan 2020). Bengaluru has been, perhaps, wiped out by CBRN warfare egged by the scarcity of natural resources. The Apex City – run by the Bell Corporation – has come into being; this city reminds one of the automated, capitalism-primed domed-city in Shiv Ramdas' *Domechild* (2013), which divided the world into outside and inside. The Apex City, however,

is divided *internally* by a shield wall: a shabby, penury-ridden dystopia for the 'analogs' and the climate-controlled, ostensibly-utopian sector meant for the 'virtuals'. The differences between the haves and the have-nots are extremely pronounced: (pod) homes, (hypercapitalist) economy and (fractured) ecology are all deformed. The zero world appears here: the seeds of the Apex City could be traced back to when the 'ruins of an erstwhile civilization' necessitated a 'new order of governance', which was promptly supplied by the Bell Corporation. Not only did it believe 'itself to be the perfect solution', it seemed 'optimal – even utopian – for a world divided along social and communal lines, faced with the threat of dwindling resources and hostile climate'.

When asked how environment and dystopia hybridise, Lakshminarayan 'hopes for a future where we collectively direct our technology towards solving environmental crises', an effort 'where the efficacy of a solution is not gated on purchasing power'; this, however, 'is not helped by government legislations and corporate policies that actively de-prioritise the need to preserve the environment or enable solutions that can help repair the damage done' (email 2021). The story extends this line of reasoning: the analog section of town is dilapidated, polluted and overcrowded; scrap metal and junkyards litter the place and its word-picture is captured by a 'solitary child' as he 'sits on a merry-go-round made from the ancient remains of a satellite dish'. However, on the other hand, the 'virtuals' section across the Carnatic Meridian is climate-controlled, where 'thousands of employees are ensconced in bio-mat and frosted-glass spirals, absorbed in HoloTech experiences'. Despite a dedicated 'Museum of Analog History', aesthetics (and not just politics) finds itself being contoured by the dominant paradigms: 'on their eastern walls, a well-known artist directs a crowd of analogs towards the completion of a mural' that 'reflects their past and celebrates their present'.

A metaphorical wall also cleaves the society apart: the top one-percent own and control everything. The top twenty-percent constitute the upper class and have the privilege of

accessing the arboretum, among other things. The middle-class is the next seventy-percent, who are allowed 'Hyper Reality gardens, [and] the occasional houseplant', an illusion of power. The lowest are the ten-percent, *les damnés de la terre*, who are barely 'given the right to breathe'. While the virtuals are protected by a 'SunShield Umbrella which orbits the Apex City' and provides climatic conditions 'optimised for human performance', the analog side is 'exposed to heat waves and dust storms'. It is here that socio-political dystopia(s) fuse with ecological catastrophes, and where home, economy and ecology intersect. Janet Fiskio opines that to 'engage with GCC as a phenomenon of meaning and politics, rather than merely a biophysical problem, requires engagement with the texts and images that reproduce these axiological narratives' (13). The story draws upon epistemes of hypercapitalism, cyberpunk, ecological dystopia, acute socio-political differences, mass exploitation and environmental degradation etc.

The unnamed protagonist of the story is an exile who belongs to the lowliest ten-percent of the society. She is a Robin Hood (Nayaka) for the analogs, stealing from the rich (virtuals) and giving it to the poor (analogs). The identity of the narrator remains a closely-guarded secret – especially since her acts of 'subversion' range from stealing precious life-saving medical technology from the Bell Corporation during a cholera epidemic to securing 'holo-watches' which processed 'a thousand bottles of [potable] water'. She is 'discreet', 'invisible' and relies on 'dead drops', 'paper money' and 'safe capsules buried underground' to escape 'raid-bots'. However, the sword of Damocles hangs over her: a 'vegetable farm' looms large ahead, and Nayaka is aware of how she could be 'harvested' at any time (hints of *Soylent Green*), alongside other 'non-performing assets' of a society that swears by order and utility.

One day Nayaka impersonates a gardener to cross the 'Carnatic Median' to execute a heist. She makes her way across this technologised marvel, and teleports to the estate of Sheila Prakash, a 'HoloTech Mogul'. She comes across 'clear blue skies overhead and verdant

meadows', a holographic simulation – that, arguably, exists alongside (real) trees that curve 'on either side of her, all along the city's borders'; while the analogs 'have no conception of a tree', here, in the virtual side, 'thousands of trees flower in desolation'. This dovetails with how 'in many contemporary eco-dystopias, technological means both a movement away from and simultaneously into or towards nature – away from nature-as-nature-as-garden, a constructed, mediated, still essential to our definitions of urban space...' (Hughes and Wheeler 2013). The protagonist is given the task of bringing 'all trees to flower by 3.49 p.m.' and she 'powers up her jetpack' and heads into the canopies with a 'sap-scanner, pruning shears and InstaBlossom compounds'. She locates a blindspot in the 'PanoptiCam' and steals 'three buds' and an InstaBlossom sachet. Nayaka returns to her own impoverished sector and plants a tree at the 'confluence of alleyways at its heart'; she drops a bud into a 'shallow pit', uses InstaBlossom and 'sacrifices a bottle of water'. A 'sapling plunges into the earth' and a tree 'shoots upwards with a shriek, reaching for the sky' – and the tree is greeted with gasps of wonder as it flowers. The resistance gets a new symbol – and the analogs get a reason to fight. Nature becomes worth nurturing, and our day after tomorrow can be better than the tomorrow – if the walls are pulled down.

With home, economy and ecology seriously compromised, Apex City creates a dystopia for many – at the expense of creating a utopia for a few. When asked how strains of predatory capitalism infect social justice and political-economic equality, Lakshminayaran responds that 'historically, we have perpetuated systems that have resulted in the uneven distribution of rights and opportunities across the human race. The fallout is our present reality, where socio-political divides and economic rifts continue to grow unchecked'; she further emphasises on how 'climate crisis, unsustainable population growth' and 'the lack of access to healthcare brought to light by the COVID-19 pandemic' necessitate a re-examination of our

world so that 'the disparities dividing the human race' can be resolved by their projections 'into the future' (email 2021).

Conclusion

Darko Suvin locates SF's 'specific modality of existence' as 'a feedback oscillation' that swings between the reader's/writer's reality to the world of the text 'in order to understand the plot-events' and then return to the reader's/writer's reality 'to see it afresh from the new perspective gained' (*Metamorphoses* 1979). Griffin also finds that 'designing an effective visual metaphor to facilitate useful individual encounters with the complex and overwhelming problem of species and biosphere survival remains both challenging and necessary' (Griffin 2019). Bengaluru's literary projections of/in these futures become vantage points – and zones of divergence – from which one can receive 'feedback' (Csicsery-Ronay Jr. 2008) in/about our present times: a message that fundamentally changes the way we approach our present.

This today is shaped by how the nodes of home, economy and ecology within select eco-dystopias exhibit multiple modalities of engagement. Each writer evolves specific mechanics despite being influenced by a larger megatext. SB Divya, for example, asserts that her 'story is set 10 years in the future' and 'Bengaluru is not intended to be a metaphor, though it can certainly stand in for many modern cities'; she attributes the (post-colonial?) choice of this locale to her not finding 'enough non-Western settings' for SF, and that she 'had recently visited family there [Bengaluru] so the sensory details were still vivid' (email 2021). Lakshminarayan, on the other hand, harbours a (quasi-Marxist?) sentiment that views Bengaluru as 'an international technoscientific hub, and it works as a global metaphor for technocracy'; she also adds that while 'technology is not evil as it can be an enabler and a powerful leveller, but we are currently passive consumers in a top-down, capitalist system that uses its soft power to contribute to profitability' (email 2021).

Evidently, in India's (contemporary) Anglophonic SF, the home-economy-ecology trialectic ranges from deploying scientific progress and well-intentioned human bonding to prevent the eco-dystopia from happening in the first place (as in 'Microbiota'), to consciously satirizing a (mutated economy-ecology) tomorrow to make the eco-dystopia less palatable in the popular imagination ('Bluru'), to actively resisting the eco-dystopia by underscoring its deleterious impact on home-economy-ecology alike via horrifying visions of the future ('The Ten-Percent Thief'). These projections negotiate the interpolation of socio-political and economic anxieties within environmental concerns; they also explore how human behaviour and organisation exists in a feedback loop with ecological and environmental realities.

Here, India becomes a site and sight where semantic elements from socio-political dystopias hybridise with those of environmental apocalypses – in a syntax that generates impulses of resistance in our today(s). Contemporary cultural production, thus, operates as per a *dulce et utile* philosophy that warns as well as gives hope, that frightens as well and reli(e)ves, especially since 'the ecocatastrophe cannot be postponed' (Stableford 2005). Perhaps, our fictional futures are coming alive – and our planet with them.

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Works Cited

Akbar, Prayaag. 2017. *Leila.* New Delhi: Simon and Schuster.

Banerjee, Suparno. 2020. *Indian Science Fiction: Patterns, History and Hybridity.* Cardiff: University of Wales Press.

Basu, Samit. 2020. *Chosen Spirits*. New Delhi: Simon and Schuster.

Bear, Elizabeth. 2018. *In the House of Aryaman, a Lonely Signal Burns*. NA: Sobbing Squonk Press.

Bose, J.C. 2013. 'Runaway Cyclone' (Palatak Toofan). Translated by Bodhisattva Chattopadhyay. Available at: http://strangehorizons.com/fiction/runaway-cyclone/ (accessed on 12 March 2021)

Carbon: The Story of Tomorrow. 2017. Dir. Ramiz Ilham Khan.

Chattopadhyay, Bodhisattva. 2016. 'On the Mythologerm: Kalpavigyan and the Question of Imperial Science'. *Science Fiction Studies*. 43(3): 435-458.

Chattopadhyay, Bodhisattva. 2020. 'Science fiction about the future may provide solutions to today's crises'. *Sciencenorway.* Available at: https://partner.sciencenorway.no/climate-science-fiction-and-fantasy-society-and-culture/science-fiction-about-the-future-may-provide-solutions-to-todays-crises/1680746 (accessed on 21 March 2021)

Chaudhuri, Rajat. *2018. The Butterfly Effect.* New Delhi: Olive Turtle.

Chowdhury, Shovon. 2013. *The Competent Authority.* New Delhi: Aleph.

Csicsery-Ronay Jr., Istvan. 2003. 'Marxist theory and science fiction'. In *The Cambridge Companion to Science Fiction*, edited by Edward James and Farah Mendlesohn, 113–124. Cambridge: Cambridge University Press.

Csicsery-Ronay Jr., Istvan. 2005. 'Science Fiction/Criticism'. In *A Companion to Science Fiction*, edited by David Seed, 43-59. New York: Blackwell.

Csicsery-Ronay Jr., Istvan. 2008. *The Seven Beauties of Science Fiction*. Middletown: Wesleyan University Press.

David, Sophia. 2016. 'Eco-Fiction: Bringing Climate Change into the Imagination'. University of Exeter, PhD dissertation, available at: https://ore.exeter.ac.uk/repository/bitstream/handle/10871/24331/DavidS.pdf?sequence=1

Divya, S.B. 2019. 'Microbiota and the Masses: A Love Story'. In *Contingency Plans for the Apocalypse and Other Possible Situations*, 27-57. Gurugram: Hachette.

Divya, SB. Email communication. 15 March 2021.

Dogra, Sakshi and Shweta Khilnani (editors). 2021. 'Introduction: Jayant V. Narlikar'. In *Imagining Worlds, Mapping Possibilities: Select Science Fiction Stories*, 115-118. New Delhi: Worldview.

Griffin, Dori. 2018. 'Visualizing Eco-dystopia'. In *Design and Culture*, 10(3):271-298.

Doyle, Kenneth. 1993. 'Rain'. In *It Happened Tomorrow*, edited by Bal Phondke, 242-50. New Delhi: National Book Trust.

Heise, Ursula K. 2006. 'The Hitchhiker's Guide to Ecocriticism'. *PMLA*, 121(2):503-516.

Hommel, D. and Alexander B. Murphy. 2013. 'Rethinking geopolitics in an era of climate change'. In *GeoJournal* 78(3): 507-524.

Hope. 2018. Dir. Partha Sarathi Manna.

Hughes, Rowland and Pat Wheeler. 2013. 'Introduction Eco-dystopias: Nature and the Dystopian Imagination'. *Critical Survey*, 25(2): 1-6.

Johnson, Hollie. 2019. 'What is the 'eco' in 'ecodystopia'?' *The Ecocidal Imagination*. Available at: www.drholliejohnson.com (accessed on 15 March 2021)

Joshi, Ruchir. 2001. *The Last Jet-Engine Laugh.* New Delhi: Harper Collins.

Kapur, Devesh, Radhika Khosla and Pratap Bhanu Mehta. 2009. 'Climate Change: India's Options'. *Economic and Political Weekly*, Vol. 44(31): 34-42

Khan, Sami Ahmad. 2021. *Star Warriors of the Modern Raj: Materiality, Mythology and Technology of Indian Science Fiction.* Cardiff: University of Wales Press.

Lavanya, Lakshminarayan. 2020. 'The Ten-Percent Thief'. *Analog/Virtual*, 1-6. Gurugram: Hachette.

Lavanya, Lakshminarayan. Email communication. 15 March 2021.

Mathew, Varun Thomas. 2019. *The Black Dwarves of Good Little Bay*. Gurugram: Hachette.

Menon, Anil. 2019. 'Shit Flower'. In *The Gollancz Book of South Asian Science Fiction*, 51-73. Gurugram: Hachette.

Narlikar, Jayant. 1993. 'The Ice Age Cometh'. In *It Happened Tomorrow*, edited by Bal Phondke, 1-20. New Delhi: National Book Trust.

O'Hara, Dennis P., and Alan Abelsohn. 2011. 'Ethical Responses to Climate Change'. In *Ethics and the Environment*, 16(1): 25-50.

O'Yeah, Zac. 2018. 'Bluru'. In *Strange Worlds! Strange Times!*, edited by Vinayak Varma, 41-54. New Delhi: Talking Cub.

Padmanabhan, Manjula. 2004. 'Sharing Air'. In *Kleptomania: Ten Stories*, 83-90. New Delhi: Penguin.

Saran, Shyam. 2009. 'Global Governance and Climate Change'. *Global Governance*, 15(4): 457-460

Shalini, Srinivasan. 2019. 'The Road: A Fairytale'. *Strange Horizons*, Accessible at: http://strangehorizons.com/fiction/road-a-fairytale/ (accessed 15 March 2021)

Shenoy, T.G. Email communication. 15 March 2021.

Shiv, Ramdas. 2013. *Domechild*. New Delhi: Penguin.

Singh, Vandana. 2019. 'With Fate Conspire'. In *Ambiguity Machines and Other Stories,* 1-24. Easthampton: Small Beer Press.

Stableford, Brian. 2005. 'Science Fiction and Ecology'. In *A Companion to Science Fiction*, edited by David Seed, 127-141. Oxford: Blackwell.

Stern, Nicholas. 2008. 'The Economics of Climate Change'. *The American Economic Review*, 98(2):1-37.

Suvin, Darko. 1979. *Metamorphoses of Science Fiction: On the Poetics and History of a Literary Genre*. New Haven: Yale University Press.

Tharoor, Shashi. 2017. 'India's Demonetization Disaster'. In *Horizons: Journal of International Relations and Sustainable Development*, 9: 208-223.

Trexler, Adam, and Adeline Johns-Putra. 2011. 'Climate Change in Literature and Literary Criticism'. *WIREs Climate Change*, 2(2): 185–200.