The Natural Step's Commentary

on VinylPlus Progress Report for 2020

The Natural Step (TNS) supports VinylPlus by providing sustainability expertise, building capacity and supporting stakeholder engagement. It is with a sense of pride and achievement that we can reflect on the progress VinylPlus has made in the last 10 years. Now it is time to set sights on the new decade, one with new challenges and higher expectations.

Reflections on 10 Years of Partnering with Industry

Since 2010, The Natural Step has advised VinylPlus to follow a set of working principles, aim toward alignment with a scientific definition of sustainability and innovate in 5 key areas.

In this period, we have witnessed some of the changes in the industry as it has shifted from a somewhat defensive to more confident commitment to sustainability. There have been struggles and setbacks, but also many wins and much learning. We wish to extend our congratulations to VinylPlus for staying the course and sticking to its plan, which is now seen as a model for other value chains.

It is fair to say that at this point The Natural Step's views on what the PVC industry must do to secure a place in a sustainable future are well documented. Each year we have provided commentary on progress and it has been a balance to respect the industry's focus on targets up to 2020 while keeping in mind the bigger transformation journey and increased sense of urgency needed.[61]

While the surrounding context has changed dramatically and much progress has been made, we believe our initial analysis of the industry's sustainability gap remains current[62] and we encourage the industry to remember the endgame is much more critical than specific targets.

2020 in Review

Turning to the progress in the last year, we acknowledge that the Coronavirus created setbacks. On the positive side, it stimulated new ways of collaborating with less travel and emissions.

Challenge 1 – Controlled-Loop Management

The growth of recycling volumes is a clear success for VinylPlus. In this year's report we appreciate increased clarity on communicating recycling in percentage terms, the work to explain recovery options and their underlying analysis. We also welcome Recovinyl work on traceability, which is much needed.

Without diminishing the achievements on recycling, we emphasize that more attention still needs to be placed on design i.e., design of circular chemistry formulations, of products with recycled materials and for applications where PVC has the greatest circularity potential.

Challenge 2 – Organochlorine Emissions

VinylPlus reports that its key targets in this area have been achieved. It is unclear if this signals the job is done or that sights could have been set higher. In any case, monitoring should continue even if greater stakeholder focus is on climate and circular economy topics.

Challenge 3 – Sustainable Use of Additives

Regarding additives, we have mixed views about progress in the context of increased scrutiny on chemicals. For example, the new EU Chemicals Strategy for Sustainability (CSS) and work by the United Nations Environment Programme on sustainable chemistry.

VinylPlus reports an ongoing investment in shifting away from Substances of Very High Concern (SVCHs), and this is very much welcomed. Nevertheless, we see a disconnect between the definition of sustainable use of additives developed by VinylPlus and its communication in advocacy and towards member companies.

The Natural Step has worked with VinylPlus on developing the Additive Sustainability Footprint as a tool to assess performance against this definition. After piloting in 2020, it is now time for individual companies to make commitments to use this approach. We look forward to this in 2021.

Challenge 4 – Sustainable Use of Energy and Raw Materials

Progress on energy efficiency appears to have hit barriers but it is important to acknowledge the more relevant goal is to eliminate the industry's contribution to systematically increasing greenhouse gas emissions i.e., carbon neutrality. Future targets in this area will have to be much more ambitious given the EU Green Deal and commitment to decarbonization.

Regarding feedstocks, there is now commercially available bio-attributed and circular-attributed PVC with what looks like a 90-95% lower carbon footprint than conventional PVC. Surely this is an underplayed success story even if the scale is currently limited. Also, we note that the 70% of PVC waste arising that is not being recycled provides an enormous opportunity for more circular feedstocks.

Challenge 5 – Sustainability Awareness

In 2020, The Natural Step facilitated industry workshops to gather views on new targets for 2030. There has been a distinct change in sustainability awareness since we ran similar workshops 10 years prior. This is certainly an outcome of the ongoing efforts by VinylPlus to promote sustainability across the industry and beyond, through events, tools, forums, media and stakeholder engagement.

The Path Ahead

VinylPlus has clearly been ahead of the game with its voluntary commitment, but as the sustainability movement grows, we see others advocating systems thinking, sustainable innovation and bold end-game targets. It is vital that the industry does not rest on its laurels now. To keep up with an accelerating pace of change we encourage VinylPlus to pursue a new cycle of continued leadership, one that leverages technology and sustainability knowledge.

As a final note, we wish to acknowledge the enormous effort that goes into coordinating an entire industry to work toward shared objectives. We also want to thank VinylPlus for being open to input from The Natural Step acting as a 'critical friend'.

Richard Blume
TNS Project Leader & Senior Advisor

Antonio Vasconcelos
Chair of The Natural Step International

Stockholm, March 2021

61 A summary of our annual commentaries since 2011 and more details about how The Natural Step has partnered with VinylPlus are available at: ***https://thenaturalstep.org/pvc/***

62 Everard, Mark. (2019). Twenty Years of the Polyvinyl Chloride Sustainability Challenges. Journal of Vinyl and Additive Technology. 26. 10.1002/vnl.21754