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## Geosynthetic Road the Future of Construction

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Abstract: In this project of we have study about the GEOSYNTHETIC OF ROADS. In this Project explain the roads basic characteristics and Properties of Geo Synthetic Classification of soil Using we find use of layer of Geo Synthetic sub-Base and subgrade of road. Using the Geosynthetic layer in rural road construction Giving the efficient road, smooth road, saving Travel time in comparison of than other Conventional Road construction. Geosynthetic Layer in road construction is initially cost but life is long term. The geosynthetic increase the performance and life span of the road . geosynthetic increase the strength of the roadprevent slipping of the geosynthetic material is ecofriendly and it is easy to installation Geotextiles are most widely used in paved and unpaved road and this is referred to as the application of separation / stabilization of subgrade. In construction of road most of the country uses non-woven geosynthetic fabric.

Keywords: Durability, Economy, Efficient.

## REFERENCES

- [1] (AASHTO (2000). Geotextiles Specification for Highway Applications, AASHTO Designation:
- [2] M 288-00, American Association of State Highway and Transportation Officials, Washington, DC Abramson, L.W., Lee, T.S., Sharma, S., and Boyce, G. (2002). Slope Stability and Stabilization Methods. John Wiley & Sons, Inc., New York.
- [3] AASHTO (1993). Guide for Design of Road Structures, American Association of State Highway and Transportation Officials, Washington, DC.
- [4] Wilmers, W. (2002). The revised German regulations for the use of geosynthetics in road construction. In Geosynthetics: State of The Art-Recent Developments. Proceedings of The Seventh International Conference on Geosynthetics, 7(4), 22-27.
- [5] Van Santvoort, G. P. (1994). Geotextiles and geomembranes in civil engineering. CRC Press.
- [6] Webster, S. L., &Santoni, R. L. (1997). Contingency airfield and road construction using geosynthetic fiber Stabilization of sands (Vol. 97, No. 4). US Army Engineer Waterways Experiment Station.
- [7] Bloise, N., &Ucciardo, S. (2000). On site test of reinforced freeway with high-strength geosynthetics. In EUROGEO 2000: Proceedings of the 2<sup>nd</sup> European Geosynthetics Conference. Volume 1: Mercer Lecture, Keynote Lectures, Geotechnical Applications.
- [8] Han, J., & Thakur, J. K. (2015). Sustainable roadway construction using recycled aggregates with geosynthetics. Sustainable Cities and Society, 14, 342-350.

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