SNS COLLEGE OF TECHNOLOGY

Coimbatore-35.
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INTRODUCTION TO ARVR

I YEAR/ II SEMESTER

UNIT – I

Topic: Collabarative Augmented reality

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- Augmented Reality (AR), a transformative technology that overlays digital content on the physical environment, increasing connectivity across virtual spaces.
- If identified and developed well, AR in remote collaboration can not only boost productivity but also streamline employee training.’
- That’s why, going with the right AR app development company is essential to ensure a smooth implementation of the tech.

benefits

- **Real-time collaboration:** AR bridges the connection between employees anywhere in the world. It can also enable a collaborative environment for a group of people – which comes in especially handy for training.
- **Save transportation costs:** Employers need to cover travel costs for employees for certain purposes. The pricing for airplane, water, or road transportation has also experienced quite a surge recently.With AR, you can save up on travel expenses, and collaborate remotely as effectively as you would in an offline setting.
- **Save training costs:** Hiring a professional trainer or an expert could be costly.Thankfully, with AR, you can use this available resource to onboard new employees and train the old ones.
- Human errors will gradually decrease the more employees receive proper training with AR.
- **Streamline communications:** AR remote tools allow for interactive collaboration between employees, companies, and suppliers wherever they are.
- Boost productivity.A downtime in operations can result in a loss as huge as $50 billion per year.

- **Improve recruitment processes:** AR enables talent acquisition to recruit candidates from any side of the world.
- **Reduce professional training costs:** Hiring a professional trainer or an expert could be costly.For a cost-efficient alternative, you can leverage AR-powered materials for periodical training.
- **Increase documentation transparency:** Using AR collaboration tools, you can record any meeting, training, or interaction sessions along with the annotations or discussions.

- **Live text scan –** AR comes with OCR (Optical Character Recognition) technology that can help technicians and professionals identify product labels, instruction manuals, and warning labels accurately.
- **Live camera and streaming –** This comes in handy for long-distance supervision. If you send out a technician for a repair and you'd like to help solve an issue, leverage AR to connect to their smartphone or smart glasses and access. This way, you can access what your technician sees, and solve the problem faster.
- **Note-taking and recording –** Thanks to AR, you can multitask seamlessly between taking notes and recording the session without having to switch apps.
- **Centralized file management –** Numerous collaborations happen each day in an organization, to the point when it's hard to keep track of all the information. AR can be your source of truth to store all your notes and documents. Anyone who needs the file in the future can quickly search for it with a click.
- **Spatial cues support –** Make your training sessions more immersive with 2D and 3D annotations.
- **Multi-device support –** AR provides a digital tool kit complete with a technician console that can support multiple devices at once.
- **Freeze camera stream feature –** Let's say you're troubleshooting an error and you want to freeze the screen to get a closer look and a better picture of the issue. AR camera will be the perfect solution for this.

AR in Remote Collaboration Across Industries

- **Manufacturing**

- On-site industries that involve heavy lifting, such as oil rigs, power plants, or factories – especially those in remote locations – will heavily benefit from AR.
- Some jobs are so technical that they require expert assistance.
- Yet, calling out an expert will result in additional costs and waste more time.

Education

- Remote learning has become the norm for all levels of education.
- To facilitate remote learning, AR in education can launch a virtual classroom where tutors can engage students' attention with interactive 3D features.
- Not to mention, AR comes with gamification that will make learning much more enjoyable.
- To improve students' comprehension, AR-powered annotations can be leveraged to add explanations to a text, detail, or diagram

Construction

- AR enables architects and engineers to visualize, plan, and execute the infrastructure they build in a more defined way.
- Further, AR can be used to promote more safety practices in construction sites.
- Real-time information sharing also allows for efficient communications when technical problems arise.
- Plus, AR can help create the design visualization of a building.
- Potential investors can gain some insights and in turn, you can easily manage some risks and get the funding you need.


THANK
YOU!