

INDIAN CULTURE

India indeed boasts a rich and diverse cultural tapestry that spans millennia. The fusion of various customs, beliefs, and traditions has shaped its cultural landscape into a vibrant mosaic, reflecting the depth and complexity of its heritage. From the ancient wisdom contained within the Vedas to the teachings of Lord Buddha, India's cultural heritage is deeply intertwined with spirituality and philosophical insights.

Respect for elders, hospitality towards guests, and compassion for the less fortunate are integral facets of Indian culture, instilled in individuals from a young age by their families and communities. The concept of "Atithi Devo Bhava" exemplifies this hospitality, highlighting the reverence accorded to guests as embodiments of the divine.

Moreover, India's cultural heritage finds expression not only in rituals and religious practices but also in various art forms such as dance, music, and handicrafts. These artistic traditions serve as vehicles for storytelling, preserving folklore and historical narratives for generations to come.

Despite the passage of time and the influence of external forces, India's cultural essence remains resilient, serving as a guiding light for its people amidst the complexities of modern life. Through the preservation and celebration of its cultural heritage, India continues to honor its roots while embracing the opportunities of the future.

Whooping Cough is once again making headlines

■ SURJIT SINGH FLORA

Pertussis, commonly referred to as whooping cough, is a respiratory illness caused by the bacterium *Bordetella pertussis*. It is highly contagious and easily spreads from person to person. The patient experiences intense coughing fits, often accompanied by a distinct "whooping" sound as they struggle to catch their breath. Vaccination is crucial in preventing this condition, especially in infants and young children, as it can pose significant risks to their health.

According to the US Centers for Disease Control and Prevention (CDC), highly infectious whooping cough is caused by the bacterium *Bordetella pertussis*, which targets our upper respiratory system, releasing toxins that can cause inflammation in the airways.

Whooping Cough is once again making headlines worldwide. The incidence of this disease is on the rise in various regions across the globe, such as China, Philippines, Netherlands, America, and Britain. Whooping cough is a serious infection that can be challenging to detect in its early stages and has the potential to be life-threatening.

According to the National Disease Control and Prevention Administration, China has reported 32,380 cases of the infection in the first two months of 2024, including 13 deaths. This figure of infection is 20 times more than last year. Along with this, 54 deaths have been recorded so far due to whooping cough in the Philippines. Let's know about this disease and important things related to it. The initial symptoms of whooping cough are similar to those of the common cold, with nasal congestion, mild fever, and a mild cough being common. It is difficult to detect this disease until its severe symptoms appear. According to the CDC, after a week or two of whooping cough, symptoms can change to "very rapid and uncontrollable coughing fits." Also, at the end of this attack, there may be a loud "whoop"-like sound while breathing. These coughing attacks can last up to 10 weeks.

Children are more likely to have the most severe symptoms of whooping cough. Children with it usually do not cough but may stop breathing. Children and adults, meanwhile, often have mild symptoms, but bothersome coughing fits can keep them awake at night.

Once the disease is diagnosed before the cough starts, doctors usually treat the infection with antibiotics. If a patient has a cough for more than three weeks, antibiotics are not needed because the bacteria have probably left the body and the cough is the result of damage to the airways.

This highly contagious disease is spread through droplets produced when an infected person coughs or sneezes. This bacterium sticks to the lining of the airways in the throat and produces toxins that damage the cilia (small hair-like structures that help the airways clear mucus).

As a result, the airways become inflamed, leading to symptoms of whooping cough, including a severe cough, wheezing and difficulty breathing. Vaccination is the most effective way to prevent it. The DTap vaccine, which protects against diphtheria, tetanus, and pertussis, is routinely given in several doses to infants and young children from 2 months of age.

Wash hands regularly with soap and water. Especially after coughing or sneezing.

Avoid sharing personal items such as utensils or drinking cups with others. Cover the mouth and nose with a tissue or elbow when coughing or sneezing to prevent the spread of respiratory droplets.

Avoid going to school, work or other public places if you have symptoms like cough and respiratory illness. Seek immediate medical attention if you or a family member develops symptoms of whooping cough.

(The writer is a veteran journalist and freelance writer based in Bampton).

YOUR COLUMN

Dear Editor,
What is more significant in the PM Narendra Modi's April 12 Udhampur address?

Assembly elections will soon be held in J&K and UT of J&K will get state status?

Or

"Congress, NC, PDP and all other parties want to take J&K back to those old days and no one has caused as much damage to J&K as these family-run parties have done. Here political parties mean of the family, by the family and for the family".

I think the second statement is politically more significant. It means he only reiterated what the Modi Government said on August 5, 2019, when it abrogated J&K's special status and broke the 173-year-old J&K into two UTs.

The first was just a political state, which should not be taken on its face value. I firmly believe PM Modi will not allow creation of a situation leading to retransfer of state power to the parties he referred to. He knows it. Hence, possibility of assembly elections and restoration of statehood is too remote.

Time has finally come to apply the R Venkatraman's solution: statehood to Jammu, UT to Ladakh, which it already has become under PM Modi's leadership, and deal with Kashmir separately.

Prof Hari Om

Baisakhi symbolizes unity in diversity

■ OMKAR DATTATRAY

Baisakhi is the grand festival of unity in diversity as it is celebrated by the all walks of Indians with great enthusiasm and fervor. People without any distinction celebrate Baisakhi with joy and gaiety. This festival is usually celebrated every year on 13th April by people of different faiths and it is the celebration and reflection of unity in diversity which is the overriding doctrine of this great land called Bharat. The festival of Baisakhi is celebrated to mark the onset of spring in India. Ther time of Baisakhi usually signifies the end of the harvest season, and is an occasion of tremendous joy and festivity for farmers. The festival of Baisakhi is celebrated for various reasons by various people, but the celebrations are concentrated in the states of Punjab and Haryana. Baisakhi, the agricultural festival of happiness and prosperity is celebrated every year on 13 or 14 April. It is also known as Vaisakhi and is a significant festival for Sikh community. Baisakhi marks the beginning of the Sikh new year and commemorates the birth and formation of the Khalsa. The festival is celebrated to commemorate the foundation of Guru Gobind Singh's Khalsa group. This occasion is celebrated in the month of Baisakhi, that is months of April or May. Generally, Baisakhi is celebrated on 13th or 14th April every year. This is the time when farmers harvest their Rabi crops after harsh winter. Baisakhi is majorily a festival of the Hindu-Sikh people but the ones following Islam could also actively be a part of the celebrations. Baisakhi is not a festival only to mark the Sikh

new year or the first harvest, but it also marks the last Khalsa organised by Guru Gobind Singh in 1699. Baisakhi or vaisakhi as a major sikh festival marks the birth of Khalsa order by Guru Gobind Singh, the tenth Guru of Sikhism ,on 13th April 1699. Later, Ranjit Singh was proclaimed as Maharaja of the Sikh Empire on 12th April 1801 to coincide with Vaishaki, creating a unified political state. The festival of Baisakhi, which is mainly celebrated in the north Indian states of Punjab and Haryana, marks the beginning of the Sikh new year. At heart, India is an agricultural country with spring harvest marking a major festival in many parts of the country. India is a land of diverse cultures, cuisines and festivals with hundreds of festivals celebrated across the country each year. However, spring harvest is an important time in the country with people in various parts of the country praying to the gods for a better harvest in the coming year. This spring harvesting festival also coincides with the New Year in certain states and religions. On the day of Baisakhi, in the year 1699, the tenth Sikh Guru, Shri Guru Gobind Singh Ji established the Khalsa Panth. Baisakhi is also the time when farmers begin harvesting of the Rabi crops. It is a significant event for the farmers in the northern region and observed as a thanksgiving to the Gods and the natural elements. On this day Sikhs and Hindus as well visit Gurudwars in new or clean clothes and offer prayers and remember the 10th Sikh Guru, Guru Gobind Singh. What makes Baisakhi so special, is that it marks the first day of the year according to the Sikh

Calendar. Another amazing root to this festival is that Baisakhi was one the three main festivals that the third Sikh Guru, Guru Amar Das Ji chose to celebrate. Baisakhi is also the time when farmers begin to harvest the Rabi crops. It is a significant event for the farmers in the region and observed as a thanksgiving to the Gods and the natural elements. Walking up to the beautiful Baisakhi day morning is like stepping up on a fortune as one can see Punjab at its happiest and most joyful self-preparations for the festival. It begins well in advance and Gurudwaras are well decorated, men prepare and practice for their Martial Arts. In this period of celebration ,artisans from across the state and country come to sell their handicrafts all over Punjab. The purpose of the Baisakhi celebrations is to come together with the feeling of oneness and joy. Baisakhi is the festival which is the expression of communal harmony and mutual brotherhood and it exhibits the doctrine of unity while maintain diversity. Not only Sikhs and Hindus celebrate Baisakhi but people belonging to Muslim faith also actively celebrate this festival and lend grace to the festival. Thus the people of different religious communities greet each other on Baisakhi and celebrate the day with great pomp and show. On this day men, women and children dress up in their favorite traditional attire .Punjabis been outstanding hosts ,one could book a farm stay or a homestay and celebrate it with locals. Punjab tourism offers various options which can be chosen for a perfect stay. If you happen to be in Amritsar, you can have Kada Prasad

and Guru Ka Langer at the golden temple. Spectate the Nagar Kirtan and prowess of the Loins of Punjab. Baisakhi is celebrated every year on the first day of the Hindu month of Vaisakh and the Hindu and Sikh solar new year too is celebrated on this occasion. This year we will be celebrating Baisakhi on 13th April. Some of the places in Punjab to best experience the festive fanfare on the day of Baisakhi are Takht Sri Dandama Sahib ,20 kms from Bathinda. Gurudwara Takht Sri Keshgarh Sabib at Anandpur Sahib and Golden Temple, Amritsar. Baisakhi is a festival that is deeply rooted in the cultural and religious fabric of Punjab, and serves as a poignant reminder of unity ,gratitude and renewal. This vibrant celebration holds multifaceted significance, blending agricultural abundance with spiritual awakening. At its core, Baisakhi is a harvest festival, marking the culmination of the winter sowing season and the arrival of the new one. As the golden fields of wheat sway in the gentle breeze, farmers rejoice in the fruits of their labor. Baisakhi serves as a time of thanksgiving, honouring the earth's abundance and the toil of the agricultural communities. It is a moment to celebrate the cycle of life and growth that sustains us all.

In short Baisakhi is not just a religious or agricultural festival, but also a cultural extravaganza that showcases the vibrancy and diversity of India especially of the north Indian states of Punjab and Haryana.

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Electronic Media in Rural Development

■ DR BANARSI LAL

The agricultural sector is helpful to enhance the income of rural people. Many developing nations are utilizing the several modern technologies to modernize commercial agriculture. Media possesses the potential to pave the way towards a progressive change. Media acts a vehicle to disseminate information from one place to another. It influences every aspect of life and every occupation. Mass media contributes to the lives of the rural people providing the contents related to agriculture, education, health environment etc. In agricultural sector, the media has an important role in accessing the agro information on daily basis. Mass media information is helpful to improve the agricultural sector by improving the knowledge of the farmers. In agricultural sector, the use of electronic media is crucial to keep the farming community updated well ahead of time. Present Indian extension system is under tremendous pressures where the extension workers, have to cater not only vast population but also to perform input supply, administrative, election and other works. Under these circumstances, it is not practically possible to serve all the farmers, all the time for all the problems at all places when ratio of extension worker and farmer; the sender and receiver is more than 1:1000. Therefore, the potential of mass media can be exploited to serve the rural population in this direction. Communication in agriculture is not only to inform and create awareness among the farmers but also to implement new ideas that change the mode of farming. Village extension workers (VEWs) inform the farmers about the new technologies, but they are not keeping pace with the advancement of technical know-how. Secondly, the message has to travel through many stages from its source to the ultimate users. Due to this hierarchical transfer sometimes it loses its meaning and originality. Communication is the vital aspect to change the behaviour of the receiver. As a matter of fact, no executive can be successful without communicating effectively with his superiors or subordinates. Messages could be in the form of words, symbols, signs, letters or actions. The importance of communication has been greatly emphasized by all the management experts. Communication is like a part of an individual's life as well as organizational existence. Its importance is self-explanatory and is having common experience of all as well. The population of our country has already been crossed 1.40 billion and is still increasing alarmingly. It is really creating an immense pressure on the food grain production and other resources. Roughly it has been observed that there is an increase in per capita availability of food grain in India but still there is lot to

be achieved. In order to achieve the desired results ,Indian farmers really need to make the best use available modern high production oriented technologies .It has been observed that out of available agricultural technologies with research system, only thirty to forty per cent are transferred to the farmers. It is therefore needed to bring the remedial change in the system of technology transfer.

Today electronisation and mechanisation of communication technology is multiplying every day. There is need to make proper use of such communication technologies for the benefits of mankind. Electronic media have really revolutionized the communication process .Electronic media like computer; internet etc. can play the significant role in transfer of high tech agriculture from global pockets to Indian farmer's field. The modern communication technologies play crucial role in transfer of improved agricultural practices to the farmers'. These technologies have the potential to ignite the flame of interest in the farmers. Electronic media is also important for the farmers residing in far-flung areas which are lesser accessible to extension functionaries. Television has major strides in dissemination of agricultural information even in rural areas. Among new electronic technologies computers, internet, videotapes, interactive computer video technology (ICVT) etc. and video information deserve close scrutiny their use. Electronic media can be categorised in three groups as simple electronic media, advanced electronic media and other modern electronic media. Radio, television and videotapes are said to be simple electronic media because they do not need the complexities for their operation and maintenance as compared to others. Radio broadcasting in India started in 1927 and All India Radio (AIR) was established in 1936 that became Akashvani in 1957. Presently radio signal covers almost the whole country. The local radio stations are ideally suited to the dissemination of farm technologies according to different agro-climatic region. Television in India began modestly on September 15; 1959. TV is very useful electronic medium for transfer of information and entertainment. A programme known as Krishi Darshan was started on 26th January 1967 especially for the farmers. TV is considered as an important source of information and is taken as authentic, trustworthy and prestigious medium for promoting interaction and dissemination of agricultural information. TV is very easy to handle and also easy to carry. Videotape and video information are ideal medium for awareness among the farmers towards new technologies and is also helpful for motivation and change in behaviour of the farmers. Internet, interactive computer video technology (ICVT) and computer aided systems are said to

advance electronic media. These media involve more technicalities in their operation. Use of internet is increasing at a rapid speed. It is cheaper than fax and teletext. Through internet the scientists can gain instant access to the world's most advanced research facilities, can discuss their research problems with the others. The district or stage extension agencies can create their own home pages or internet for farmers use. Farmers of one place can exchange their experiences and information with the farmers of another place. Interactive video technology is an amazing device for the storage and retrieval of audio and video information. In this system the learners control the system through the computers for his interaction with the video recoded material chosen for learning. It can be used for training of extension personnel. The Chennai Dialogue Information Technology (1992) chaired by Dr. M.S Swaminathan resulted in proposal for the establishment of computer Aided Agricultural Extension (CAEs) and Information Village (IV). The purpose of Computer Aided Agricultural Extension (CAEs) is to generate and disseminate information for a locality in different areas e.g. pest and disease information, remote sensing, marketing information on different enterprises like aquaculture, waterharvesting, apiculture etc. The videotext, teletext and videoconferencing have been under the category of modern electronic media. We can disseminate the text and graphic information through videotext and then can be received either by a videotext television or on an ordinary television. A video coupled with a microcomputer permits editing as well as retrieval of information on videotext page. The video transmitted via telephone, data lines, cables etc. is called interactive videotext. It can be used in training programmes. The videotext transmission based on broadcast signals is called teletext. Teletext links a computer to a television by which text and graphic information can be disseminated on a one way basis to home viewers. Video conferencing is a two way conferencing of two or more sites that help in communication in real sense. It can be widely used for educational purpose and is helpful for quick feedback by involving more people. The electronic media can play a crucial role in the dissemination of improved agricultural innovations. Electronic media has tremendous potential for use in agricultural development. Computer networking at local, national and international level can establish a good linkage for dissemination and sharing agricultural information. But a responsible electronic communication media should be clean, comprehensive, and competent and should present the real information.

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Electric Vehicles and Pollution: Beginningand Prospects

■ DR RAJKUMAR SINGH

Electric vehicles (EVs) are often touted as a solution to reduce pollution, particularly in urban areas: a. Zero Tailpipe Emissions: Unlike conventional internal combustion engine vehicles, EVs produce zero tailpipe emissions. This means they don't emit pollutants such as carbon dioxide (CO2), nitrogen oxides (NOx), particulate matter (PM), and other harmful gases directly into the air, thus improving air quality, especially in cities where traffic congestion is common. b. Reduced Greenhouse Gas Emissions: Although EVs indirectly contribute to greenhouse gas emissions through electricity production (if the electricity is generated from fossil fuels), they typically have lower overall emissions compared to traditional vehicles. As the electricity grid continues to decarbonize through the adoption of renewable energy sources like wind and solar, the emissions associated with EVs decrease further. c. Efficiency Improvements: Electric motors are more efficient than internal combustion engines. They convert a higher percentage of the energy from the battery into motion, which reduces energy waste and overall resource consumption. d. Decreased Noise Pollution: EVs tend to be quieter than traditional vehicles since they lack the noise associated with internal combustion engines. This can lead to a reduction in noise pollution, creating quieter and more peaceful urban environments. However, it's essential to consider the potential indirect environmental impacts associated with EV adoption: e. Battery Production: The production of EV batteries involves the extraction and processing of raw materials, which can have environmental consequences, including habitat destruction, water pollution, and carbon emissions. However, advancements in battery technology and recycling efforts are helping to mitigate these impacts. f. Charging Infrastructure: The expansion of EV charging infrastructure requires energy and resources for construction and maintenance. However, this impact is typically outweighed by the long-term environmental benefits of EVs. g. Life Cycle Analysis: To accurately

assess the environmental impact of EVs, a comprehensive life cycle analysis (LCA) is necessary, considering factors such as manufacturing, use, and end-of-life disposal. While EVs generally have a lower environmental footprint compared to traditional vehicles over their lifespan, LCAs help identify areas for improvement and optimization. In nutshell, the EVs represent a significant step forward in reducing pollution and combating climate change, especially when coupled with efforts to decarbonize electricity generation and improve sustainability across the entire automotive supply chain.

Beginning of electric vehicles

The concept of electric vehicles (EVs) dates back to the early 19th century: a. Early Experiments: The earliest experiments with electric vehicles can be traced back to the late 18th and early 19th centuries. Inventors like Robert Anderson and Thomas Davenport built rudimentary electric vehicles powered by non-rechargeable batteries. b. Development of Rechargeable Batteries: The development of rechargeable batteries in the mid-19th century, notably lead-acid batteries, provided a significant boost to the feasibility of electric vehicles.

Lead-acid batteries allowed for more extended periods of operation and recharging, making electric vehicles more practical. c. Growth in Popularity: Electric vehicles gained popularity in the late 19th and early 20th centuries, especially in urban areas where they were preferred for their quiet operation and lack of emissions. They were commonly used for tasks such as local deliveries, taxis, and personal transportation. d. Competition with Internal Combustion Engine Vehicles: Despite their advantages, electric vehicles faced stiff competition from internal combustion engine (ICE) vehicles, which benefited from advancements in gasoline and diesel engines, as well as the availability of cheap petroleum fuels. e. Challenges: Electric vehicles encountered several challenges during this period, including limited range, high cost, and the lack of infrastructure for battery charging and swapping. f. Decline in Popularity: By the

early 20th century, the mass production of gasoline-powered vehicles by companies like Ford and the discovery of large petroleum reserves led to a decline in the popularity of electric vehicles. Gasoline vehicles offered greater range and convenience, while advancements in engine technology improved performance and reduced costs. g. Resurgence in Interest: Interest in electric vehicles experienced periodic resurgences throughout the 20th century, driven by factors such as oil crises, environmental concerns, and technological advancements. h. Modern Era: The modern era of electric vehicles began in the late 20th and early 21st centuries with the development of advanced battery technologies, improvements in electric motor efficiency, and growing concerns about climate change and air pollution.

Prospects of electric vehicles

The prospects of electric vehicles (EVs) have been shaped by various factors, including technological advancements, environmental concerns, government policies, and market dynamics:

a. Technological Advancements: Continuous advancements in battery technology, electric drivetrains, and energy management systems have significantly improved the performance, range, and affordability of electric vehicles. Innovations such as lithium-ion batteries, solid-state batteries, and regenerative braking have enhanced the efficiency and reliability of EVs, making them increasingly competitive with traditional internal combustion engine vehicles.

b. Environmental Concerns: Growing awareness of climate change, air pollution, and the environmental impacts of fossil fuel consumption has prompted individuals, businesses, and governments to seek cleaner transportation alternatives. Electric vehicles, which produce zero tailpipe emissions and can be powered by renewable energy sources, offer a promising solution to reduce greenhouse gas emissions and improve air quality in urban areas.

c. Government Policies and Incentives: Many governments around the world have implemented policies and incentives to pro-

mote the adoption of electric vehicles. These include financial incentives such as tax credits, rebates, and subsidies for EV purchases, as well as regulations mandating vehicle emissions standards and promoting the deployment of charging infrastructure. d. Market Demand and Consumer Preferences: There is a growing demand for electric vehicles among consumers, driven by factors such as fuel cost savings, performance advantages, and the desire to reduce environmental impact. Automakers have responded to this demand by introducing a wide range of electric vehicle models across different vehicle segments, offering consumers more choices and increasing competition in the market.

e. Cost Reductions and Economies of Scale: As production volumes of electric vehicles have increased, economies of scale have led to cost reductions in key components such as batteries, electric motors, and power electronics. Lower manufacturing costs have contributed to the declining prices of electric vehicles, making them more accessible to a broader range of consumers and businesses. f. Advancements in Charging Infrastructure: The expansion of charging infrastructure networks, including public charging stations, workplace charging, and home charging solutions, has addressed one of the key barriers to electric vehicle adoption range anxiety. Improvements in charging technology, such as fast chargers and wireless charging systems, have further enhanced the convenience and accessibility of electric vehicle charging. The convergence of these factors has created a favourable outlook for electric vehicles, with projections indicating continued growth in EV adoption globally in the coming years. Despite these challenges remain, including the need for further infrastructure investment, overcoming consumer concerns about range and charging, and addressing supply chain constraints for key components like batteries.

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