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Quadrilateral Contact Group (QCG) background

Relevancy

- GS Prelims, GS Mains paper
- Quadrilateral Contact Group, Taliban Peace talks
- Afghanistan Peace process

Recently

- The Quadrilateral Contact group met again after its collapse last year during the second week of October 2017 in Muscat.

Quadrilateral Contact Group (QCG) background

- This group includes Afghanistan, Pakistan, the US and China to bring peace and stability in Afghanistan.
- Since its inception in January 2016, it had multiple meetings, ending in May 2016 with the killing of Taliban leader Mullah Mansour in Balochistan.
- Mansour carrying a Pakistani passport raised many questions concerning US-Pakistan and Pakistan-Taliban relations, leading to the end of QCG in early 2017.
- Quadrilateral Contact Group 2.0:
- There has been a QCG meeting in Muscat in October as its revival.

Relevance of QCG

- The QCG would make it an important pillar for the US in Afghanistan.
- It provides Islamabad leverage vis-à-vis the US and Afghanistan.
- The QCG provides an opportunity for Pakistan to control and, if needed, even sabotage the Afghan peace process.
- These member nations are willing to come together and discuss the roadmap to a peaceful Afghanistan in spite of tensions.
- This shows huge commitment of these nations to peace and a brighter future.

What are the shortcomings of QCG?

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- **Difference between Good and Bad Taliban:**
 - US believes that there is a “good Taliban” and a “bad Taliban” which in difference doesn’t exist.
 - The QCG will not succeed unless the Taliban comes to the negotiating table which will not.
 - The latest twin attacks in Gardez (Paktia province) and Andar (Ghazni province) in Afghanistan a day after the QCG meeting in Muscat reveals Taliban’s stands on the peace process.
- **Taliban not involved in Peace talks:**
 - The second is Pakistan’s inability to bring the Taliban to the negotiating table.
 - Perhaps Pakistan has greater influence on the Haqqani Network, but not the Afghan Taliban.
 - For instance: when Pakistan wanted the Afghan Taliban to give up Osama bin Laden due to American pressure, the Taliban refused.
 - Also, the collapse of the Doha process with the Taliban was primarily because of Pakistan’s reluctance.
- **Exclusion of Russia:**
 - The QCG will not succeed with China inside and Russia outside.
 - The larger question of US-Russia relations and the American position in Syria and Iraq is forcing Russia to react in Afghanistan.
- **QCG internal rivalry:**
 - Pakistan and Afghanistan are not ready for peace as both Kabul and Islamabad have their own road maps, contradicting each other.
 - Afghanistan has been constantly exploring alternatives to reduce its dependence on Pakistan.
 - The government in Kabul is not keen on the QCG.
 - US has put pressure on Kabul to talk to Islamabad and the Afghan Taliban.
 - Else, the Afghans would certainly want the Americans and Pakistanis to remain outside any internal peace initiatives.

What is Industry 4.0?

What is Industry 4.0?

Relevancy

- GS Mains paper III
- Industry 4.0
- Challenges and solutions
- Think Global, Act Local

What is Industry 4.0?

- Infinite spurring technologies like robots, artificial intelligence, 3-D printers, etc. are collectively known as 'Industry 4.0'.
- It is a name for the current trend of automation and data exchange in manufacturing technologies.
- It includes cyber-physical systems, the Internet of things, cloud computing and cognitive computing.
- It is also known as the fourth industrial revolution.
- Industry 4.0 creates what has been called a "smart factory".
- Within the smart factories tech-processes create a virtual copy of the physical world and make decentralized decisions.

Challenges posed by Industry 4.0

- Generally revolutions are disruptive, and the fourth industrial revolution, or industry 4.0, is no exception.
- In the near future it would be hard to find new people with necessary digital skills to run new systems and adapt them to future technologies.
- The ability of smart systems to communicate across factories and with suppliers and customers that have different systems also emerged as a concern.
- Investing in smart factories increased the risk of security breaches by the hackers.
- Loss of many jobs to automatic processes and IT-controlled processes, especially for lower educated parts of society.

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How to mitigate these problems?

- **Think global, act local:**
 - All countries plan to take actions to protect their citizens against the adverse effects of these challenges.
 - Though some forces creating these challenges will cross borders, and are therefore global, responses must fit different local conditions.
 - They also need to cooperate to implement appropriate local solutions.
- **Government policy:**
 - Governments should be cognizant of the change in the economic climate which is under way.
 - It would be wise to know that it will not change overnight, and that its effects will be differentiated according to local conditions.
 - Many policy changes are necessary to support millions who will be affected, including labour laws in factories, and social security systems.
 - Local governments and stakeholders must do a systems analysis of their present situation and of how new forces will affect it and evolve apt solutions.
- **Industrial flexibility:**
 - A good 'industrial policy' for an economy must be an ongoing process of systematic stakeholder collaboration, to self-adapt and produce outcomes desired by stakeholders.

What are robots?

Relevancy

- GS Mains paper III
- Robotics, Artificial intelligence
- Labour loss, unemployment, Government initiatives

What are robots?

- The field of robotics is the outcome of scientific research and development.
- Robots are man-made motorised devices that can move by themselves, whose motion must be modelled, planned, sensed, actuated and controlled.
- A robot is a device which is:
 - reprogrammable
 - multifunctional
 - designed to move material, parts, tools, etc.
- The design of a given robotic system brings together doctrines of electronic engineering, mechanical engineering and computer science.
- These are very useful to humans as these manmade machines traverse harmful terrain, perform surveillance missions, and other remote functions.

The Robotic revolution (Artificial Intelligence, AI)

- India understands the importance of robotics in numerous fields
- It has opened up endless possibilities in every field.
 - By 2013-2014 – Agricultural robots
 - By 2013 – 2017 - Robots that care for Elderly
 - By 2013-2020 – Nano Robots
 - By 2015 – To have one third of its fighting capacity provided by Robots
 - By 2017 – Medical Robots performing low invasive surgery
 - By 2017-2019 – Household Robots
 - By 2035 – To have first completely autonomous Robot soldiers on the battlefield
- The robotic revolution could be a chance to free millions of people from a system of exploitation of labour which is unprecedentedly inhumane.

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- There also a continuing percolation from the agricultural sector, through urbanisation and its consequences, into the service and manufacturing sectors.
- Farming also is being substituted by Artificial Intelligence.
- There is a dream of a future of wide urbanised class with more leisure time due to robots.

Labour loss due to technology

- Automated systems here have replaced educated and skilled employees.
- In Agriculture and primary sector machines have led to mass scale unemployment.
- Robots can now self-learn and become more intelligent over time replacing people in services such as infrastructure maintenance, parts of application development and maintenance, etc.
- Temporary or permanent job losses result from technological innovation.
- Economists predict that by 2021, four out of every ten jobs globally would be lost because of automation and of these, one in every four, will be from India.
- The bigger concern is lesser job opportunities for the semi-skilled.
- Technology unemployment could only heighten social tensions and agitations by the Gujjars, Jats and Patels vying for government jobs.

How to tackle Robot triggered unemployment?

- More labour-intensive industries should be promoted in rural areas, like garment and textiles, electronics assembly, toys, infrastructure and housing.
- Government should support sectors with the potential to employ more, and industrial policies that incentivise jobs, more than capital.
- To enforce a high international minimum wage for displaced workers.
- Alternative form of ownership of the robots should be thought of like nationalization.
- They should be public property, since they are objects that occupy and operate on public grounds, impacting public economy and nation-wide employment.

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- Private companies owing robots could be taxed so that 30% of the revenue they raise with their work goes directly to finance the pension funds of the workers made redundant by robotisation.
- A socially sensitive policy should gather advantages from higher robotisation and distribute them to the work force by creating job alternatives.
- Or by providing subsidies and employment systems with less working hours such as part-time and work from home.

Conclusion

- Government must defend its workforce from an eventual robot takeover.
- Global agencies should also examine how unfair the labour system has become and how robotics could contribute to change that.

Report on Childhood stunting

Report on Childhood stunting

Relevancy

- GS Mains paper III, Essay
- Stunting in children, malnutrition
- Government initiatives

Recently

- The World Bank has recently released its 2018 World Development Report titled “Learning to Realize Education’s Promise” which focusses on education and child development.

Report on Childhood stunting

- The report discusses the far-reaching impact of poverty and chronic malnutrition on the physical and mental development of children.
- The effects of stunting in the early years on physical, cognitive and socio-emotional development prevent children from learning well in later years
- The report points out that in low-income countries, stunting rates among children under-five are almost three times higher than in the richest
- Reduction of child stunting should be one of the major moral imperatives before nations today

What is meant by stunting?

- It is defined as the percentage of children, aged 0 to 59 months, whose height for age is below the standard or normal value.
- It is the impaired growth and development that children experience from poor nutrition, repeated infection, and inadequate psychosocial stimulation.

Impacts of stunting

- There exists a stark difference in brain development between the stunted child and the one who is not stunted.

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- The fiber tracts in the brain of the child who is not stunted are denser, and the connections more elaborate, than those in the brain of the stunted child.
- Intense deprivation can hinder the brain development of young children.
- It is also associated with long-lasting harmful consequences, including
 - diminished mental ability and learning capacity
 - poor school performance in childhood
 - reduced earnings
 - increased risks of nutrition-related chronic diseases, such as diabetes, hypertension, and obesity
- The effects of childhood stunting remain into adulthood.

How poverty leads to stunting?

- Poverty leads to stunting via interrelated factors such as:
 - Severe deprivations in terms of nutrition
 - unhealthy environments and lack of sanitation
 - lack of nurture by caregivers
 - repeated episodes of illness in childhood
- Mothers from poor families are undernourished and anaemic which leads to the birth of unharlthy babies.
- Poor infants' diets are also poor and its effects become irreversible by the age of two.
- As high as 70 per cent of adolescent girls in India are anaemic which has an impact on the health of their future pregnancies and children.

Stunting in India and World

- Stunting and other forms of under-nutrition are thought to be responsible for nearly half of all child deaths globally.
- Stunting prevalence varies across states and countries.
- In India, 38 per cent of children younger than five years of age are stunted.
- India has highest number of stunted children in the world, (46.8 million children) representing one-third of the global total of stunted children.

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- The levels of stunting in children is above the national average in Uttar Pradesh, Bihar, Chhattisgarh, Gujarat, Meghalaya, Madhya Pradesh, and Jharkhand.
- Prevalence of wasting is highest in Madhya Pradesh followed by Jharkhand, Meghalaya and Bihar.
- The lifelong effects of stunting are said to result in at least 10 per cent decrease in future income over the lifetime of stunted adults.

Ways to tackle

- Countries need to strengthen the nutritional intake of mothers, newborns and infants.
- Countries should focus on improving poor sanitation and hygiene to improve health and chances of survival of children.
- A key strategy should be tackling open defecation and the lack of sanitation facilities for whole communities so everyone is aware of its importance in child survival, nutrition and growth.
- It can only be tackled fully with a focus on ensuring doctors, nurses and mothers to have clean hands from the moment a child is born, breastfed or when food is prepared.
- Followed with adequate water and sanitation facilities in both health centres and in homes.
- People should be motivated to use toilets, to change the beliefs, opinions and behaviour of whole communities.

Indian Government's initiatives to tackle the problem

- In 1970s India launched Integrated Child Development Service (ICDS) programme for:
 - early childhood care and development
 - improving child nutrition and health by providing supplements
 - immunisation, and health check-ups for children between 0-6 years of age
- However, a new strategy is now needed, that goes beyond the ICDS and recognises that stunting reduction needs action from more sectors like:
 - Scale up of resources for nutritional inputs
 - focus on antenatal and postnatal care
 - sanitation

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- counselling of parents for effective early child stimulation
- Government run programmes such as the National Rural Drinking Water Programme (NRDWP), and the Nirmal Bharat Abhiyan (Total Sanitation Campaign) to encourage communities use their own latrines.
- Stunting is directly linked to the second, and indirectly to several other of the Sustainable Development Goals (SDGs), to which India is a signatory.
- World Health Assembly (WHA) has also adopted a special set of six nutrition targets to be achieved by 2025, the first of which is a 40% reduction in number of children under-5 who are stunted.

Conclusion

- Preventing stunting is critical to the survival in long-term, to ensure healthy, well-educated and productive adults.
- Tackling this insidious disease should be a critical aim for all the countries globally.