NAVODAYA VIDYALAYA SAMITI
(ACADEMIC WING)

Guidelines for Online Education

It is observed that online teaching learning in Navodaya Vidyalayas is not being conducted in a uniform and organized manner. Various online platforms are being used by the teachers without monitoring attendance system, proper assessment and non availability of recorded interactions. To conduct the digital learning in an effective and organized manner during the ongoing pandemic situation, the comprehensive guidelines for online learning is required to reiterate the directives given by Hqrs. from time to time.

The measures to be taken at Regional Office level/ JNV Principal level and Teachers level for organising effective online education, are given below :

(A) At Regional Office Level

1) Use of Learning Management System (LMS)- A proper Learning Management System should be adopted at regional office level with creation of login for all Principals, Teachers and Students and with provision of Admin Login at RO level, all the JNVs in region should ensure utilization of LMS for conduct of online learning, Providing personalised E- content/ projects for students, assessment and performance analysis of the students as well as monitoring of classes at School level and Regional Office level. As already decided, **Microsoft Teams for Education** is to be used for digital learning in all JNVs, wherein user ID has been created for all the Principals, teachers and students. All Regional Offices must be boarded on MS Teams for Education.

2) WhatsApp /Telegram group – Subject wise groups of teachers should be created at cluster level for sharing of resources and resolving queries of teachers. Principal/ Vice Principal having the similar subject would be added to this group as facilitator. Assistant Commissioner Cluster Incharge would also be a part of the Group.

3) Providing Help and coordination for JNVs- Assistant Commissioner Cluster Incharge would coordinate the proper functioning of online education in the cluster JNVs

4) Monitoring- Effective Monitoring of every JNV is to be done to ensure that no child is left behind due to any constraints.

5) Plan of supervision of online classes should be prepared by each Cluster Incharge and timely guidance/remediation should be given in respect of each teacher of the cluster.

(B) JNV Principal level :

1) Providing enabling resources to Teachers- The JNVs should ensure that all Teachers are well equipped for providing online learning to students in a structured manner. Hence, JNV Principal has to ensure the following points:

1.1 Devices- 545 JNVs are having Samsung Smart Classes with 40 laptops / tablets in each class. Apart from this, desktop computers are also available in JNVs. For conducting online classes, available laptops/tablets/desktop should provided to the teachers for taking online classes in JNV. All devices must be made functional for proper utilisation.

1.2 Digital Classroom and virtual classroom have been established in 99 JNVs under project from Ministry of Minority Affairs. All the teachers should use digital/virtual classrooms for online classes.

1.3 Connectivity- Internet connectivity through rationalised Wi-Fi networking (Classes assigned/divided to particular Wi-Fi router) is to be ensured in all classrooms and Labs so that teachers can effectively use ICT infrastructure of JNV for online Teaching learning.(If needed JNV may procure and make available Mobile data devices/dongles to teachers for online classes in existing budgetary provisions.

1.4 E- content provided by NVS HQ/NLIs, Online learning Guidelines by MoE and NCERT, Handbooks and resource material for Teachers by CBSE is to be made available to all teachers by JNV.

1.5 Graphic Tablet (Digital Pad n Pen) may also be provided to each teacher as an alternative of white board, for making online content transaction more effective.

1.6 Minimum digital infrastructure in classroom – Each classroom/Labs/other rooms may be equipped with minimum infrastructure required for teaching online classes i.e.

desktop/laptop/tablet with web camera and internet facility so that the teachers can take online classes by using infrastructure of JNV.

2) **Mapping of Availability of Devices with Students**- Each student is to be personally contacted and Student-wise mapping of full access, limited/ shared access or no access to any form of digital device for each child is to be done accurately by every school to provide need-based interventions for enhancing learning of all students.

3) Strategy for reaching out to all the students- Strategy is to be chalked out by the school for each student in consultation with teachers and JNV has to ensure that for each class and each student (i) Mode of communication (ii) Learning plans and (iii) Necessary well-being support has been identified. Specific strategies need to be framed for student who can be reached through Online Mode, Partially Online Mode and Offline Mode.

   3.1 **Online Mode –** Online classes should be organized in structured manner using Learning Management System and ICT infrastructure available with JNV.

   3.2 **Partially Online Mode-** Teachers may share E- content/PPT/ Class video or Links of resources available at DIKSHA/e PATHSHALA/ NROER/NDL or any publicly accessible platform with students/parents through Social Media/messengers App. etc. Teachers can also suggest activities (experimenting, further reading etc.) to be done offline for further exploration. The teacher may also interact with students through WhatsApp, Phone call, Video call, text messages to clarify/ enrich/ teach the content.

   3.3 Offline Mode

   - Class Teachers may be instructed to keep track of children not having digital devices and should remain in touch with each child through telephonic contact or through indirect contact (Any parent/relative or other JNV student nearby/ Peer group/Alumni).

   - Contact numbers of subject teachers and Principal/ VP should be provided to all students, so that doubt clarification can happen telephonically.

   - Instructional Package (Supplementary learning material/workbooks, worksheets, quizzes etc.) and Learning resources, such as Exemplar Problems, Bridge course material should be delivered to homes of learners in addition to Core learning material (Textbooks and stationery).

- Group/peer learning with the help of teachers may be adopted-Teachers can form groups of students who stay in nearby locations, some of them having devices for online learning (same or different classes) and empower them for peer learning/tutoring. Teachers can keep in touch with the peer group through formation of WhatsApp groups/ Phone calls. E-content or Learning guidance may be delivered to the student through peer group.

- Mobile school/ Home Visit- In case of non availability of any contact to the student or few students in nearby area, teacher may visit at a centrally located place, with transport support provided by the JNV to help and guide such students.

- Hard copy of assignments may be provided by post/messenger/any other mode.

- Where Television is available, the students should be encouraged to view Class wise resources transmitted on TV channels like SWAYAM-Prabha etc. (Class wise channel available at Swayam Prabha / e-Vidya are given at **Annexure 'A'.**

- Child may be facilitated to go to nearby KV or any CBSE/ State Board School for guidance. Necessary coordination may be done by JNV in this regard.

4) Implementation of Digital Education

- Online class time table at JNV level should be framed keeping in view the Pragyata guidelines, Ministry of Education.

- Give 10-15 minutes break between two consecutive classes for students to relax and re-energize themselves to focus on the next class.

- Involve teachers and representatives of parents in chalking out modalities of digital education. A systematic timetable (with detailed online and offline activities) for each class may be planned in consultation with all the teachers.

- The Alternative Academic Calendars (AAC) developed by NCERT should be adopted in alignment to the specified learning outcomes.

- Integration of art music and PE should be taken with proper perspective for promoting health and wellbeing of student and emphasis should be on activities.

- Focus should be on Activity and project based learning and assessment should be competency based.

5) **Monitoring** :

- Child-wise tracking and monitoring of progress of learning; separately for those who have access and for those who have no access to digital devices should be adopted. Mapping of specific academic requirements in respect of each and every child should be done.

- Attendance of students in online classes should be reviewed in each class on weekly basis to ensure continuity of curriculum transactions. The parents of the students, who are not attending the classes, should be contacted to ensure the attendance of their wards in online classes.

- JNVs should create WhatsApp/ telegram groups for each class, which may include Principal, Vice Principal, Class Teacher, Subject teachers along with students and Parents. This group may be utilized for Tracking of progress of students, clearing of doubts of students and parents and dissemination of necessary information of school activities.

- Principal should conduct staff meeting fortnightly to monitor the coverage of syllabus, assessment, despatch of instructional package to the children who are not having any device.

6) **Cyber Safety and Mental Health Support during Digital Education :**

- Orientation of teachers, parents and students about using digital technology for teaching-learning and assessment may be done.

- Students, Teachers, and Parents may be oriented on Do's and Don'ts of engaging with digital learning and cyber safety and security.

- Teachers and parents may be vigilant enough to pick up clues for unusual behaviour of any student and connect them to counsellors for help. A regular conversation with children to ensure their safety and well-being must be maintained.

- Parents may be guided to have a regular communication channel with the school (counsellor, teacher, other staff) to better monitor and help children in their learning progress and wellness.

- Students should be encouraged to maintain a balanced schedule for online and offline activities.

- They should be motivated to explore further through activities, experiments, reading books etc. as a follow up to online class.

- Adequate physical and mental health practices need to be adopted while pursuing digital education. Poor ergonomic practices, prolonged exposure to digital devices and lack of physical activities can have a negative impact on the physical and mental wellbeing of student.

- Regular counselling support should be provided to the child by counsellors engaged in JNV.

7) **Supporting Online Learning of Children With Special Needs (CWSN) -** Develop/Identify and use resources like audio books/ talking books, TTS (text to speech), sign language videos, audio tactile materials, etc. Chapter briefs may be prepared by teachers in multiple formats such as text, audio (voice recorded), audio with visual support etc.

8) **National Initiatives for Digital Education and Teacher Preparation:**

   Teachers and students should be made aware of various initiatives for digital education available on Government Portals for utilisation as per academic requirement. The details regarding the links of different resources and portals are given in **Annexure 'B'.**

C) Teacher Level :

There is a need to shift the emphasis from academic content alone to social emotional aspects or affective learning. The affective learning would enable the child to connect to real life situations and would provide the foundations for academic content.

1. Planning by the Teacher

- Every Teacher should maintain the complete detail about each student regarding availability and accessibility of digital gadgets and facilities, parents support, Socio-economic status of parents, educational status of parents, learning style, physical disabilities that requires any special attention, mode of communication etc.

- **Identifying key Learning Outcomes to be focused upon** –The curriculum and syllabus need to be analysed at the school level for mapping it with learning outcomes. Rather than following textbook content with rigidity, the learning of children at homes needs to be aligned with the themes given in syllabus, and children are to be assessed accordingly on the basis of learning outcomes**.**

   The following may be identified:

   i. Concepts which children have already learnt in earlier classes and need to be contextualized for self-learning at home.

   ii. Concepts which may be learned through community participation; such as agriculture, art and culture. Parents may be

oriented on guiding students through activities for specific classes.

    iii. Concepts which are new and unfamiliar and require explanations on the part of teachers.

    iv. The complex concepts should be sorted out for teaching through teacher-directed learning mode.

- Teachers will need to prepare specific Child-wise learning plans depending upon access or no access to device; this would include innovative steps for reaching the last learner.

- Every teacher will prepare competency based lesson plan as communicated vide NVS letter dated 16/6/2021.

- Teacher may use digital resources embedded in **Alternative Academic Calendars (AAC)** developed by NCERT for different stages. Theme wise activities and also guidelines for conducting these activities are given in the Alternative Academic Calendar developed by the NCERT.

- For Online Education the teacher is required to adopt digital technology for teaching their students more efficiently and for their own professional growth. Teachers must be ready to harness the potential of digital technology. The teacher may explore digital technologies (LMS, apps, web portals, digital labs etc), national repositories like DIKSHA, ePathshala, NROER, NDL, e-content portals of different states, contents from Open Educational Resources (OERs) like PhET, Khan Academy, MERLOT, Geogebra to use appropriate technology for teaching learning & assessment.

2. Content Transactions :

- Both synchronous and asynchronous mode of learning transactions should be adopted to cater to the need of students having shared devices or unstable internet connectivity.

- Students who have access to digital devices for learning may be provided with online classes, and activities through Learning Management System (LMS) and students interact during live sessions or through forums/groups in LMS. All The resources to be shared in the LMS itself and assignment submission also happens in the LMS.

- Teacher should Encourage peer discussion and interaction during online classes.

- Teachers may use Instant Messaging/Chat groups/emails involving parents (wherever required) for sharing important information, resources, suggestions and follow up activities and also provide an overview of the coming week's topic or a recap of the previous week's work.

- Home assignments may be thoughtfully given to supplement to class teaching.

- Creative interesting assignments may be given to children such as listening, and reading stories/ articles followed by activities like drawing inferences, adding/changing the climax at the end, picture reading, art and craft, puzzles, observational projects etc. Projects assigned may act an extension to classroom teaching.

- To ensure focus on learning outcomes/active learning of students, ample time should be devoted for learner centred activities for each subject.

- Suggest activities that: (i) are age appropriate, simple to do at home and have learning goals that focus on building concepts/ skills among children. (ii) are meant for holistic development, and parents can easily assist their children in doing the activities. (iii) encourage children to explore, observe and experiment using objects easily available in their surroundings/ localities.

- Virtual experiments can be conducted using O Labs platform.

- Tracking or follow-up of the given session and assignment is necessary, otherwise, children will lose their interest. Teachers need to track progress either on LMS, WhatsApp or phone. Students must keep these assignments in a file for submission to the subject teachers.

- Teacher should provide regular feedback on the responses and performance of students. Students must get feedback/appreciation from the teachers after completion of the assignments.

- Doubts may be cleared during online teaching/ over phone calls. Doubt-clearing sessions should be organized for students after completion of every chapter/ theme.

3. **Assessment**
   - Assessment may be made an integral part of online learning programs in order to ensure achievement of learning outcomes at each level. Teacher should develop and use formative assessments for immediate and continuous feedback, this would help the teacher and students improve in the learning process.
   - Assessment should be done more frequently and in simple ways. Teachers can prepare subject/topic/grade wise simple assessment formats and rubrics for parent/self/peer/ teacher assessment.
   - Assessment should be competency based tests, Quizzes, Activities, Projects and assignments etc.

- Remediation program imparted should be adopted on graded pattern to ensure that each group of students get the questions of their level so that equity in participation could be achieved.
- Teachers should not become judgemental on the performance and competency of the child.

4. <u>Cyber Safety Measures</u>

- Do not share personal information, textual communications, videos or images of students on social media for any purpose. Create a congenial, safe and secured online learning environment.
- Talk regularly to students in understanding and encouraging the responsible use of the internet and netiquettes.
- Make students aware about cyber bullying and other cyber security threats and how to avoid these.

ANNEXURE 'A'

e-VIDYA CHANNEL NUMBERS

DD FREE DISH & DISH TV :

Class	Swayam Prabha Channel Number	DD Free Dish DTH Channel Number	Dish TV Channel Number
PM e- Vidya6	28	28	2027
PM e-Vidya7	29	29	2028
PM e-Vidya8	30	30	2029
PM e-Vidya9	31	31	2030
PM e-Vidya10	32	32	2031
PM e-Vidya11	33	33	2032
PM e-Vidya12	34	34	2023

In addition to this, few other DTH Operators are offering some of the e-Vidya channels:

DTH Operator	Class	Channel No.
Airtel	VI & IX	437, 440
TATA Sky	VI & IX	756
Den TV	VI & IX	517, 527

ANNEXURE 'B'

LINKS FOR THE PORTALS/ RESOURCES

Sl	Name of the Portal	Link
1.	Pragyata Guidelines for Digital Education	https://www.education.gov.in/sites/upload_files/mhrd/files/pragyata-guidelines_0.pdf
2.	NCERT Learning Enhancement Guidelines	https://ncert.nic.in/pdf/announcement/Learning_%20Enhancement_Guidelines.pdf
3.	NCERT Alternative Academic Calendar	https://ncert.nic.in/alternative-academic-calendar.php
4.	CBSE Cyber Security Manual	http://cbseacademic.nic.in/web_material/Manuals/Cyber_Safety_Manual.pdf
5.	Guidelines for parent participation in home based learning	https://dsel.education.gov.in/sites/default/files/update/MoE-Home-Learning-Guidelines.pdf
6.	DIKSHA Portal	https://diksha.gov.in/
7.	SWAYAM PRABHA	https://www.swayamprabha.gov.in/
8.	Class wise Video Archive	https://swayamprabha.gov.in/index.php/program/archive_se/23
9.	NIOS Course material for Persons with Disabilities	https://nios.ac.in/online-course-material/course-material-for-divyang-students.aspx
10	SWAYAM Courses for School level	https://swayam.gov.in/explorer
11	NTA Abhyas	https://nta.ac.in/abhyas
12	e- Pathshala	https://epathshala.nic.in/
13	NROER	https://nroer.gov.in/welcome
14	NDL	https://ndl.iitkgp.ac.in/
15	PhET	https://phet.colorado.edu/
16	MERLOT	https://www.merlot.org/merlot/
17	Khan Academy	https://www.khanacademy.org/
18	Geogebra	https://www.geogebra.org/?lang=en