

Good Practice in the use of Video Conferencing

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After using Video Conference technology in the school environment for the past ten year, it has been possible to make judgements about which factors improve the chances of success and make for a meaningful, educationally rich experience for pupils and teachers.

The following are some of those judgements!

The key to successful Video Conferencing is in the planning

Like most educational activity, the same criteria for effective practice apply. Starting with the planning.

- Ensure the purpose of the Video Conference link/project is clear.
- Be clear what you, the children and the remote location expect the learning outcomes to be.
- Decide how many Video Conference sessions are needed.
- Decide how long each Video Conference session will be.
- Decide what content is planned for each session, and agree what work will take place between sessions.
- Have a pre-conference conference. Meet the key professionals involved. Develop a dialogue and partnership with them. Plan the Video Conference lessons together. Agree the exact timing of the lesson – for far away locations ensure the time difference is taken into account.

Well before the conference session:-

- Let the pupil's parents know what the school is doing and encourage their involvement.
- Across the sites, share the lesson plans and any handouts or computer files being used in the lesson.
- If pupils are presenting during the conference, rehearse them in front of the camera, in the relevant location and position. Note timings, speech clarity and lighting. Ensure any research to be completed by the children before the session has been done thoroughly and is understood.
- Have an alternative lesson ready – just in case the technology goes on strike.
- Make sure a list is available that contains:-

- The names of the schools involved and their telephone and fax numbers
 - The names of the people involved and a list of pupils taking part
 - Any mobile phone numbers that will be available on the conference day
- Develop a technical ‘trouble-shooting’ check list. It may include a step-by-step, what to check if:-
 - There is no sound at the local site
 - There is no sound at the remote site
 - There is sound but no picture at the local site
 - There is sound but no picture at the remote site
 - Feedback from the speakers occurs
 - No connection takes place
 - Poor picture and sound quality occurs
- If it is an international conference, learn something about the locality and some opening and closing phrases in the country’s language.
- If it is a multipoint conference (with more than two sites connecting at once), clarify who will lead the session and establish a protocol for interaction between the sites and for any discussions across the conference.

Just before the conference session:-

- Check any battery requirements (particularly if using a radio microphone). In many remote controls, when the battery is close to exhausted, the remote will work if it is closer to the equipment. This may give the impression the battery has plenty of charge left.
- Check all equipment is working and connected correctly (this may involve making a connection with a ‘test site’). This could take as little as three or four minutes.
- If using a camera with pre-set position capability, set the presets before the session.
- Check the camera picture. Minimise reflective surfaces (polished floors etc). Reduce clutter or distracting objects in the background. Check the camera is in the best position to capture everything that will happen during the session.
- Check your clothing on screen for colour and pattern clashes.
- Have some spare A4 pieces of paper, a pencil and a large black marker available (the latter being useful if initial sound problems are encountered and the local site resorts to writing messages to the remote site).

- When the pupils are in situ, prepare them for the conference. Settle them down, explain again what will happen and how the session will be structured and conducted.
- Make sure you are familiar with the 'mute' button on the videoconference remote control handset.
- Check volume levels and ensure the volume is not too loud or that the speakers are not too near the microphone.

At the beginning of the session:-

- Introduce yourself and the pupils at the appropriate time.
- Exchange brief information about your location, describe the room, the time, the weather, how many and who the pupils and teachers are.
- Introduce the lesson focus and any procedural information.
- If it is a multipoint conference, establish any suitable protocols. Many multipoint conferences use sound levels to determine which site is viewed across the conference. In this instance it may be appropriate to reinforce the importance of each site switching on their mute facility to allow a broadcast to take place.

During the session:-

- Talk naturally, at an even pace, with expression and clarity (emphasise pitch, tone, volume pausing and pacing).
- Keep instructions clear; check all participants understand what is expected of them.
- Remember that an animated, energetic, enthusiastic presence is critical when motivating, holding attention and emphasising teaching points.
- Look at the camera, not the screen.
- Involve the remote site and the local site equally. Think of the camera as another pupil.
- Share work across the sites and encourage participation. Encourage contributions from teachers and support staff as well as pupils.
- Do not talk for more than ten minutes without a break
- Keep changing the pace. Use a variety of teaching styles and methods. Utilise direct teaching, display materials, kinaesthetic activities, tasks and teaching.

- Be sensitive to the 'public' dimension of the camera. Some pupils do not enjoy this potential exposure and regard the camera as akin to a live television broadcast. Enable these pupils to participate indirectly until they feel ready to take centre stage.
- Manage the 'mute' button. Many multi-point conferences are automatically managed by giving the 'floor' to the site making the most noise. If all the sites connected are sending a lot of noise across the videoconference network there will be confusion. Wherever possible get used to switching your videoconference system to mute whenever your location is not directly contributing anything. Only take off the 'mute' when someone at your location wished to speak.

At the end of the session:-

- Summarises the lesson and its key teaching points and features
- Take time to thank the participants and close

After the session

- Phone, e-mail or Video Conference with the remote site. Thank them for their participation. Share opinions, discuss technical and pedagogical issues. Seek to improve further the learning experience, the teaching experience and the management of the Video Conference session
- Critically evaluate the session and the additionality contributed by the use of Video Conferencing and an assessment of the impact the session has had on learning. This may involve e-mailing an evaluation form to the participating sites.

Useful tips:-

- Be aware of child protection issues that may cause the system to be open to abuse. Do not leave the Video Conference system on 'auto-answer'. Do not leave it in conference and unattended. Make sure parents are informed when a Video Conference session is to take place and that they are happy for their child to take part.
- Make sure audio and visual displays are clear. Interactive whiteboard displays, Overhead Projectors, posters and objects can all be used to enhance the learning experience. It is important to check that print can be clearly read at the remote site. Displays of this kind should be created with increased contrast between backgrounds and foregrounds, and with bold outlines.
- Consider a screen switch. During a VC session, seeing the other site on a screen will often fixate pupils. This can result in them becoming distracted from the work in hand. Consider having two screens with a screen switch between them, or a screen that can be easily swivelled so that it can be viewed by the teacher and away from the pupils when needed.

- Place a viewing screen below the Video Conference camera. It is much easier and natural to conference when the camera is placed just above or below the viewing screen. This enables the participants to both view the remote sites reactions while at the same time appearing to look directly into the camera.
- Place written information below the camera. Again, this enables the teacher to easily view lesson notes, key pointers and lists, while at the same time maintaining visual and facial contact with the remote site.
- As in any good lesson, vary the pace, involve the participants, and give shape and clarity to the lesson with a clear beginning, middle and end.
- Cameras. Pan and tilt cameras/ preset cameras offer valuable variations, which can add interest to the viewing. If possible, have another adult in the room to control the zoom and panning of the camera.
- Consider at least one session that brings everyone together from both the localities e.g. a tour or special presentation
- Be aware of what the viewer is seeing and prepare beforehand for minimum distractions. If the background is fussy or cluttered, change the view or provide a plain cloth backdrop.
- Avoid leaving the camera in a static position for too long. If using pre-sets on the camera, have some that zoom in on a pupil or the presenter from time to time.

Title of Video Conference session	Video Conference checklist
Date of Video Conference session:-	
Time of session (local time)	Time of session (remote location time)
Lead person (local)	Lead person (remote)
Names of additional support (local)	Names of additional support (remote)
Telephone number (local)	Telephone number (local)
Mobile number (local)	Mobile number (remote)
ISDN number(s) (local)	ISDN number(s) (remote)

CHECKLIST

Pre planning session taken place?	
Lesson plans, files, handouts etc. shared?	
Test connection taken place?	
Parents informed about session?	
Alternative lesson planned?	
Batteries checked?	
Connections checked (including volume)	
Pres-set camera positions checked?	
A4 piece of paper and pen available?	
Anything else?	