

Introduction

Chomsky's language acquisition states babies have a biologically determined ability for acquiring language, that is supported by rich learning experiences in the environment and narratives (Baxter, 2022). The national Literacy trust (no date), First Cry Parenting (2022) and Oschner Health (2022) recommend storytelling as a beneficial method of interacting with a foetus as it establishes a strong attachment of trust and a release of positive emotions and reduce anxiety through responses to what they are hearing through familiar sounds and tones of voice. (Conkbayir and Pascal, 2014). As babies develop through their early life pre-verbal, storytelling introduces children to connect unfamiliar words to meanings, concepts and objects which expands their vocabulary (Whitehead, 2010), (Yumus and Turan, 2021). The repetitive story patterns allow a child to practice memorizing the words, raising phonological awareness and auditory processing skills which are essential for learning to read and write (Ece Demir-Lira et al, 2019), (Dickinson, 2003). Exposure to stories allows children to associate the spoken word in printed text and begin to place letters and sounds together and understanding the spoken and written language.

Analysis of activities

The story selected for both activities was the Three Little Pigs, which according to Bower (2014) is a tale that demonstrates a structure, repetition, and patterned language that supports the skill of memory in Children. Activity one is a reading of a paper version of the story through the medium of Welsh, introduced as a second language, where activity two is a reading of an alternative version of the story, in English and accessed from a digital method of access, which was supported by an interactive memory game, matching the written word with pictures. Thomas et al (2021) highlights the significance of learning two languages to expand a wider knowledge of literacy, such as comparing, using two groups of letter knowledge, how letters have different phonological sounds and through oral comprehension in understanding stories. Lindon (2012), Hammer et al

(2014) and Castro et al (2011) agree that young children require the correct modeling of spoken language from adults and their peers to imitate and practice speaking for themselves. The sounds and rhythm offered by the adult when telling a story allows children to understand and analyse the rules of speech offered when learning to speak their native tongue.

Demir-Lira et al (2018) and Fisher (2016) suggest that the quantity and quality of meaningful book reading interactions between adults and children as early as possible and explores a connection between this and later literacy skills, such as vocabulary acquisition, reading comprehension and motivation to read. Bateman and Cekaite (2022) believe that language, literacy, and communication has a holistic approach in supporting development. Whitehead (2010) explored the structure of a story in how they teach children patterns in events of a story and how this applies to their own learning and lives. In the story involved in both activities, mathematical language and recognition of numbers were offered to demonstrate the events that occurred and when in the story.

Activity one demonstrated the writing of numerical and letter forms of numbers and allowed children to mark these through carving onto the pigs made from playdough and placed in order of sequence, supporting mathematical development (Purpura et al, 2011), (Curriculum for Non-maintained Nursery Settings Wales, 2022) and (Hall and Robinson, 2016). Scientific literacy, curiosity, and technology areas of learning in the curricula are relatable through the experimentation of blowing materials and the mark-making on the playdough pigs in Activity One and the exploration of the interactive game in Activity Two. Exploring the properties of materials and how these properties affect the behaviours observed when they are blown (Kahler et al, 2020). (Curriculum for Wales, 2022), (Curriculum for non-maintained nursery settings 2022). Carrying out the blowing of the materials in activity one supports imaginative play and the sounds of blowing and splashing is where the actions of children to imitate characters in the story support children's language and literacy (Whitehead, 2009). The skill of listening and following instructions in the mark-making in activity one, the blowing of varied materials using their mouths and the control of their finger touch in selecting the tiles in the interactive memory game demonstrates a variation in refining gross and fine motor

skills, therefore supporting physical development (Curriculum for Non-maintained Nursery Settings, 2022).

Neaum (2018) endorses activities like these, as an informal, play-based approach that attracts the attention of young learners, in comparison with the more formal teaching and assessment methods of learning to read and write. Both activities offered opportunities for adult direction, such as modeling, asking questions and demonstrating play, and opportunities for child initiation, where the tuff tray and the interactive game were offered for independent playing once the activities were demonstrated. Xu et al (2014) argues that children require hands-on experiences to allow them to conceptualize meaning to the narrative in storytelling, such as spoken or written word to achieve success in learning to read and write when they are older. Both activities demonstrated narrative skills through open ended questions, phonological awareness through analysing how words in Welsh and English are pronounced correctly and recognising letters of words in alphabet knowledge. Hamre et al (2010) and Waters-Davies (2022) argue that the thought-out planning, delivery, and participation from a practitioner in storytelling and activities like these attain as much significance in supporting achievements in literacy in younger children as child-initiated activities in supporting language. Both story activities involve comprehension, are stimulants for language and expansion of vocabulary through regular use of open-ended questions, repetition, praise and scaffolding of learning offered by the adult (Kucirkova et al 2014).

Zhao et al (2022) discusses the significance of interactive games and e-books on touchscreen devices and how these support children's literacy development, however, games are only effective when true communication and collaboration is achieved with adults and children, to offer guidance and model learning. Van Tonder et al (2019) recommend the fostering of literacy development through opportunities for child-initiated learning, such as playing interactive games. Digital competency allows Children to become critical thinkers and broaden their range in creativity. Mills et al (2023) recommends interactive games through digital media that allow opportunity for children to engage in thrilling play and foster children's attention and memory skills. Kucirkova (2018) shares four elements that apply to the role of the adult in fostering children's

digital competency, according to Salmon's five stage model of teaching and learning which relates with the digital aspect of storytelling which are planning and importance of a clear aim, encouraging exploration and building in motivation, focus on sharing and collaboration and ensuring learning outcomes are aligned with assessments. Kucirkova (2018) explores the benefits of an e-book in contrast to a paper-based book is the varying range of interactions a child can encounter through a touchscreen, such as dragging, tapping and swiping and teaches a different method of cause and effect.

Donohue (2015) believes children's use of technology and interactive media supports children's healthy growth and development, learning, strengthen adult/child interactions, foster relationships, and promote healthy social and emotional development and pro-social behaviours. According to Land (2007), Self-regulation is achieved through active listening, following instructions, participation, attention to the tasks, and organising materials. Children that display positive self-regulation perform more effectively in the learning of literacy, oracy, and writing. They indicate that teacher-led instruction requires preschoolers to show skills they have not yet developed, such as sitting still and attending well for a long time. They recommend interventions carried out through multimedia platforms are an exemplary method for fostering emergent literacy skills as they can be modified to support individual learning needs (Land, 2007). Both activities fostered self-regulation to show control and motivation to achieve the goals required. (Lonigan et al, 2016). The format that a story possesses, such as a beginning, middle and end, analyzing events and feelings of characters in both story activities allow a child to begin to interpret sequences of events in their own lives, what occurred during their day and how they felt about what occurred, which enhances their narrative skill and oracy development which is developed through experience in storytelling activities. The emotion recognition of characters in a story allows children to understand personal feelings and those of others (Weiland and Yoshikawa, 2013) (Suggate et al, 2018). The belonging and humanities areas of learning in the Curriculum for Wales (2022) and the Curriculum for non-maintained nursery settings (2022) relate to the stories children were asked in activity two to make connections through thinking about their own houses and comparing them to the ones that the little pigs built and thinking about why people have houses.

Bowlby's attachment theory suggests that children require strong attachments with adults in the early years of a child's life to ensure healthy development in emotional and behaviour regulation (Conkbayir and Pascal, 2014). The role of the adult is to ensure meaningful interactions are achieved in storytelling. In both activities it is apparent that attachments are made between the adult and children through praise and recognition of children's motivation and responses to activities, which are foundations to early literacy development and enhance cognitive growth (Dickinson et al, 2019). Skibbe et al (2019) share evidence of a correlation between strong self-regulation skills and success in language, communication and literacy development and higher levels of vocabulary. The stronger the attachments between caregivers and children allow improvement of their skills of self-regulation. Self-regulation is an essential skill achieved in personal, social, and emotional development to achieve academic success in literacy, oracy, and writing. Lindon (2012) believes children who have not formed strong attachments have not received the care and interaction with others and hear the language required to learn to speak, which can result in delayed oracy and literacy and are less resilient and confident in utilising the cognitive processes involved in executive functioning, such as memory, inhibition control and shifting (Chan and Rao, 2022). According to Lindon (2012), B.F. Skinner's approach to ensure strong attachments are formed between children and practitioners and children develop accurate oracy when parents and practitioners reward achievements in learning language and not mistakes. Praise and reward should be offered for attempts in language. Their confidence grows and begin to place these words they have learned together to form phrases and sentences. Both story activities involve comprehension, are stimulants for language and expansion of vocabulary through regular use of open-ended questions, repetition, praise and scaffolding of learning offered by the adult (Kucirkova et al 2014).

Neaum (2018) and Van Viersen et al (2018) explore a connection between delays in oracy in younger children and negative outcomes in literacy development as they grow. Hayes (2016) highlights the significance of language delay and dyslexia and how social and environmental factors can influence these issues. This indicates that opportunities that encourage oracy in younger Children, such as these storytelling activities can limit the risk of delayed literacy. Land (2007) suggests executive function is a construct that

unites working memory, attention, and inhibitory control to plan and executing goal-directed activity. Executive functions have been shown to be dependent on neural systems of the prefrontal cortex. Damage to the frontal lobe impairs planning, self-monitoring, attention, and responsiveness which are essential skills for literacy development.

Vygotsky's Social Constructivist Theory in relation to literacy is readers initial emotional response to events in the story helps develop empathy during comprehension which is a skill for self-expression and understanding the feelings and needs of others (Lindon, 2012). It endorses group activities where children of all abilities sit together and children who are delayed in language can observe other children interacting with the story and answering questions. The scaffolding of learning in activity two was the numerous attempts of selecting different tiles to match the written word and the image correctly demonstrates attention and memory skill and how it supports children's literacy. (Lysaker, 2018) and (Aubrey and Riley, 2022). Kuhl (2011) agrees that a social setting and social interactions are fundamental in how children learn language, through observation of how their peers communicate and interact with tasks.

Zubrick et al (2015) and Van Tonder et al (2019) agree where emergent literacy is concerned, activities like these allow a practitioner to assess children's interaction and abilities in oracy, writing, digital and literacy competency through comprehension and observation to determine whether further support needs to be offered to individuals to ensure equal learning success and intervene promptly when required. (Hayes, 2016). Vygotsky's Scaffolding of learning approach is apparent through both activities, through asking leading questions and allowing children to revisit tasks within the activity to improve their craft to achieve their learning goals (Aubrey and Riley, 2022) (Kucirkova et al, 2014) and (Grimmer, 2021).

In conclusion: Storytelling supports literacy development through interaction from adults and their peers. Storytelling activities allow children to continue to refine their language skills and understanding of linguistic structures as they develop. Adults play a crucial role in supporting children's language development through asking questions and

delivering activities that stimulate language acquisition to ensure positive learning outcomes.

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