

# **Expectations of Time Spent on Homework: A Comparative Study of Japanese and Australian Primary Schools**

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Baker and LeTendre (2005) suggest that there is a tendency towards an inverse relationship between the amount of homework assigned and effective educational practice: “in the most effective systems little homework is given” (p.14). The Third International Mathematics and Science Study (TIMSS, 1995, cited in Baker and LeTendre, 2005) reveals that Japan is ranked third from the bottom amongst thirty-nine nations in terms of the amount of maths homework given per week. This ranking seems to contradict the Japanese work ethic and the common perception of long hours devoted to study. Could it be true that Japanese children achieve high results in international mathematics assessments despite spending relatively little time on homework?

Japanese education underwent radical changes between 1992 and 2002 in a policy initiative known as *Yutori Kyoiku* (Relaxed Education). School attendance on Saturdays was gradually reduced and then eliminated, and the curriculum content was reduced by 30%. The TIMSS figures refer to 1995, by which time these reductions had started to take effect. Is it possible that the time spent on homework could have diminished even further since 1995?

This study was prompted by contradictory views expressed by parents from English-speaking countries and Japan concerning homework. Many parents in Japan send their primary children to cram schools after hours to revise the same material learnt at school. This suggests that in their view the

children are not getting adequate academic input and homework from school. In contrast, many English-speaking parents of children in Japanese schools lament the quantity of homework set by teachers (despite the recent popularity of Japanese-style after-school learning centres). The appraisal of homework between many Japanese and English-speaking parents appears to diverge. These conflicting views prompted the current exploration of homework practices in Japanese and Australian primary schools. This study is not limited to Mathematics homework however, but also includes comparisons of literacy homework.

This is not an attempt to defend a position regarding whether children's interests are furthered by more or less homework. Rather, it is an exploration of the amount of time devoted to homework and the rationale behind this in each culture.

## **Literature Review**

### *Background of East Asian and English-Speaking Cultures*

Although many differences exist between Australian and other English-speaking countries, and Japan and other East-Asian cultures, there are also many broad similarities that may be pertinent to the present discussion. The following review of cross-cultural studies of homework practices between English-speaking countries and East-Asian cultures can provide a background to cultures sharing a common heritage, although clearly cannot automatically be generalized to Japanese and Australian educational practices.

Dandy and Nettlebeck (2002) compare homework practices of Chinese-Australian, Vietnamese-Australian and Anglo-Celtic Australian children. Although their study was within a single educational system, it reveals considerable differences between the time devoted to homework between the different ethnic groups. Chinese-Australian children reported

completing an average of 11.99 hours per week, Vietnamese-Australian children an average of 8.55 hours per week, and Anglo-Celtic children an average of 4.69 hours per week. Furthermore the parents of different ethnic groups reported varying attitudes towards the amount of homework set. According to the teachers in the study, Chinese and Vietnamese parents complained about an insufficient amount of homework, in contrast to Anglo-Celtic parents who complained of too much homework.

Other studies of the relative performance of ethnic groups within a single culture include those conducted by Peng and Wright (1994), Keith and Benson (1992) and Mau (1997). Peng and Wright (1994) argue that Asian American students outperform the academic achievement of other minorities because of "certain home environments and educational activities that are conducive to learning" (p. 346). Keith and Benson study the effect of the variables of ability, motivation, quality of instruction and academic instructional time, in relation to the grades of high school students from five ethnic groups in the US. Of interest here is their finding regarding Asian students:

"[N]ot only do Asians report completing more homework, on average, but that each hour of homework they do complete has a *greater effect on their learning* than for other ethnic groups." (1992, p. 91) Mau's (1997) study of Year 10 students in the US similarly reveals Asian immigrants and Asian-Americans spend more time on homework than White Americans. Mau attributes this to the importance the former attach to hard work, and high parental expectations.

Chen and Stevenson (1989) review homework practices in an international study of Chinese, Japanese and American children, and conclude that time spent on homework correlates with academic performance. However this correlation did not apply within the cultures. According to

Chen and Stevenson, the proportion of time children spend on homework within a culture is due to individual variability of teachers and children.

### *Orthographic Depth*

Arguably more complex and orthographically opaque writing systems necessitate a greater time to be devoted to homework. One of the reasons children in Japan may require more homework could be the greater orthographic depth of Japanese than English. Ellis et al. (2004) completed a detailed study of the relationship between orthographic depth and reading acquisition of Albanian, Greek, English and the Japanese syllabaries of *hiragana* and *kanji*. They consider *hiragana* to be “the most transparent orthography” (p.454), followed by Albanian, Greek, English and *kanji* (p.455). They conclude that the difficulty of learning to read aloud is relative to orthographic transparency; hence *kanji* is much more difficult for children to learn to read aloud than *hiragana*: “Children schooled in these writing systems have greater difficulty and take longer in achieving this goal” (2004, p. 455).

If the acquisition of Japanese were limited to *hiragana*, one could speculate that Japanese children would devote less time to homework than those from English speaking countries, because a transparent writing system would require less time to be mastered and used as a medium for learning other subjects. However, *kanji* is more opaque than English, and hence more time-consuming to master.

### *Accuracy of Form*

Ho (2002) argued that Australian policy documents do not attach as much importance to spelling as policy documents from Hong Kong attach to the importance of writing Chinese characters: “This discrepancy in attitude towards writing conventions reveals a basic cultural difference. In the

Chinese culture, the aesthetic aspect of the codified, standardised form is an important criterion for text acceptability” (p. 298). Because of the commonalities of Chinese and Japanese scripts, which require precision and detail, this observation could also be generalized to Japanese.

Stephens and Blight (2002) outline differences in the Australian and Japanese educational approach to early literacy relating to the goals of self-expression and accuracy of form. Beginning writers in Australian classrooms are permitted to use invented spellings. Correct spelling is not insisted upon in the very early stages of free writing. Rather the emphasis is on self-expression. In Japanese schools children use pencils and erasers in free writing so that an error can be easily corrected. This leads to compositions with considerably fewer errors than those done by Australian children.

An emphasis on accuracy would place greater demands on children to master written conventions at an earlier stage. Children are required to spend more time on drill practice and consequently fewer errors are apparent in compositions. Arguably, time demands on homework in a culture that demanded accuracy of form would be greater than those from cultures in which this had a lower priority.

### *Controversies Regarding Homework*

The value of homework has been the subject of considerable debate in twentieth-century America (Bempechat, 2004; Gill & Schlossman, 2003; Gill & Schlossman, 2004). Gill and Schlossmann (2004) argue that in 1930 in the US, homework was regarded as a health hazard by the American Child Health Association. Education of the whole child was emphasized rather than purely academic skills. Despite studies indicating the benefits of homework such as Paschal et al.’s (1984) synthesis of studies of homework between Years 4 and 10, a large-scale British study (nearly 20,000 pupils) of

homework at the primary school level reported a higher frequency of homework to be associated with lower achievement (Farrow et al., 1999). Cooper (1989, cited in Cooper et al., 1998) in a review of 120 empirical homework studies reported that at high school level, the students doing homework outperformed those not doing homework by 75%. At the junior high school level this effect was reduced by half, and at primary school the effect of homework on achievement was minimal.

These criticisms of homework find less support in Japan. The proliferation of cram schools suggests that rather than parental concern about too much homework, parents feel pressure to increase the load of academic demands. This is a response to a meritocratic educational system in which achievement in the early years can influence career pathways and thus future status. Pressure may be exacerbated by the practice of ranking students in middle school across all classes in the year level according to academic performance. Parents are required to indicate they have witnessed the report of their child's ranking with their personal seal. This pressure may underlie parents' attempts to help children consolidate basic skills at the primary school level before they progress to middle school.

### *Individual Differences*

In Japan, the importance attached to effort may result in a reluctance to acknowledge learning difficulties:

It is assumed that all children are capable of mastering the content of each lesson. Some children are expected to do this more rapidly than others, but all students are expected to succeed. Every child knows the saying "*yareba dekiru*" (If you try hard you can do it). There is little discussion of differences in ability. (Stevenson, 1991, p. 117-118)

In contrast, McPake and Powney (1998) assert that “British teachers accept, for the most part unquestioningly, the notion that pupils will display a wide range of abilities and grades, and this expectation can become ‘self-fulfilling’. (p. 175) Similarly, an assumption of differences in ability is implicit in the Australian practice of assigning different kinds of homework to children in the same class according to their individual progress. Primary school teachers are advised:

In order to cater for the range of children in the class, it may be wise, then, for teachers to give children a number of tasks that they can choose from over the term, keeping this homework optional. (Zammit, 1992, p. 11)

Teachers are advised that homework should not be “the same for everyone at all times” (p. 44). This is because of individual differences regarding independence, home environment, the pace at which the child works and the child’s interests. This is in clear contrast to homework in Japan, which is usually set regardless of individual differences.

McPake and Powney (1998) in their comparison of Japanese and British educational philosophies argue that British education is characterised by the children learning to draw on multiple sources of information, developing critical skills and having their own opinion, whereas Japanese children acquire a “vast knowledge bank” (p. 174) which is made possible by attending to teacher and textbook, and extensive memorization skills.

### *Recommendations of Time Spent on Homework*

The Japanese Ministry of Education and Science gives only vague direction as to how much homework should be done, so it is up to the

individual schools and teachers to determine this. Kariya et al. (2002) indicate that the average daily time spent on homework by primary school students in Japan is 51.2 minutes for high achievers, 38.8 minutes for middle ranking achievers, and 35.3 minutes for low achievers.

Kishimoto (2004) recommends the following formula for the time Japanese primary children spend on homework: ten minutes multiplied by the Year level. Hence ten minutes for Grade 1, twenty minutes for Grade 2, 30 minutes for Grade 3, progressing to 60 minutes for Grade 6. He recommends an upper limit of twenty minutes multiplied by the Year level, hence 20 minutes for Grade 1, forty minutes for Grade 2, one hour for Grade 3 and progressing to two hours for Grade 6.

The Premier of Queensland, Australia, advised the following times for homework: a maximum of one hour per week for Years 1, 2 and 3, a maximum of 2-3 hours per week for Years 4 and 5, and a maximum of 3-4 hours Years 6 and 7 (Queensland Government, 2006). Suggested amounts of homework in other English-speaking countries are similar. The former British Prime Minister, Tony Blair, suggested 30 minutes a night for primary school children (Farrow et al., 1999). In the US the recommendation by the National Parent Teacher Association and the National Education Association is a maximum of 20-30 minutes a night for K-2 and 30-60 minutes for Years 3 to 6 (Henderson, 1996, cited in Van Voorhis, 2004).

## **Method**

I was in the fortunate and rare position of having direct long term experience of homework practices in the capacity of a parent in Japan and Australia in a period spanning over seven years. Japan was the base country but I was able to observe Australian homework practices during approximately 4-6 weeks in Terms 1 and 3. This provided the opportunity to

observe the impact of teacher demands on children during times of the day not normally open to observation by researchers. I observed the homework requirements from this viewpoint of two primary schools in Australia and two in Japan. Being public schools, they all had children from a range of socio-economic backgrounds, but were situated in relatively affluent areas within the cities.

Homework diaries, school homework policies provided to parents and parental experience with homework demands over the six years in Japan and eight years in Australia provide some insights into the time demands made of children in the respective countries.

This study is based on the homework given to two participants. Children attend primary school for eight years in South Australia from Reception to Year 7. Japanese children attend primary school for six years. Since most of the schooling took place in Japan, the data is more extensive for the time spent in Japan. The period under review in Australia included an extra year (Reception) before Year 1, and an extra year after Year 6, and so has greater breadth. Although the entire span of primary education forms the background of the study, there is a particular focus on Years 3 and 6.

Clearly homework requirements did not apply to exclusively to the children in this study, but to all the children in their classes, so it can be considered a study of homework requirements of ten Japanese primary school teachers and thirteen Australian primary school teachers. In both the Japanese and the Australian schools homework requirements were recorded daily from the black/whiteboard in homework diaries. Hence the homework can be considered representative of that given to all students in the classes. Class sizes were an average of 35 children in the Japanese schools and 25 children in the Australian schools.

## **Discussion**

### *Actual Time Spent on Homework*

In the case of one of the Japanese schools, Year 3 students were advised to spend 30 minutes per night on homework. Unlike the Australian schools, the Japanese schools did not provide parents with an explicit homework policy across all year levels. At one of the Australian schools under observation, the homework policy was 20 minutes for Year 3, between 20 and 30 minutes for Year 4, between 30 and 40 minutes for Year 5, between forty minutes and an hour for Year 6, and one hour for children in Year 7. It was stated that homework was to be done a maximum of four nights a week for each year level. Hence the recommendation for time spent on homework at Grade 3 was 1.5 times greater per day in the Japanese school than the Australian school. Furthermore Australian children spent four nights a week on homework compared to five nights a week for Japanese children.

Japanese children had lengthy holiday assignments whereas Australian children had none. Maths drills were demanding; a Year 3 winter homework assignment consisted of six multiplication charts to be filled out, each consisting of sixty-four sums, two hundred division problems, thirty-two addition problems and thirty-two subtraction problems. The time it took the child to complete the multiplication, addition and subtraction charts had to be recorded. This was simply the mathematics homework; there were additional assignments for literacy, music and calligraphy.

Children in Japan were assigned daily homework which was marked daily. This indicates a teacher directed approach. In the Australian school observed children in Year 3 and above were given flexibility in choosing when to do their homework because it was due to be handed in weekly. Hence children themselves could determine how much time they allocated to homework each evening. It was stated in the school's rationale

for homework for the upper primary school, that children develop study habits such as “time management in completing assignments, contracts”, “organisational skills in regard to sequence of tasks” and “responsibility for own progress and learning”. Furthermore the homework policy rationale urged students to “seek out their own information”. Examples of this were to “develop research skills”, “take control of their learning” and “develop initiative”. The Australian contract involved choice according to the students’ levels. This was reflected in both the choice of spelling list and the choice of reader. Student choice implies a child-centred approach, in which students have some control over the content of learning. In contrast, Japanese homework was uniform across the class. All children studied Japanese using the same textbook, and all children learnt the same *kanji* at the same time.

#### *Likely Causes of Differences in Time Devoted to Homework*

This case study suggests the children in these Japanese schools have more demands made of them regarding homework. This may be partially explained in terms of expectations regarding work and rest. Arguably originating in the Judeo-Christian tradition in western countries, there is a clear distinction between one’s own time and time for the school or workplace. Japanese management of time is more fluid; educational institutions frequently reschedule their timetables to schedule events on weekends in exchange for a holiday on a working day. In comparison, western conceptions of how time is structured are relatively inflexible. Official time off is rarely encroached upon.

Unlike their Australian counterparts Japanese children were given homework in summer and winter holidays. Given the pattern of homework on the weekend and holidays, the western concept of “time off” was not an inalienable right. In the winter holiday, children were given a timetable

listing all the days in the holiday (including the public holiday, New Year's Day), and were expected to complete a daily record of time allotted to homework. There was no directive for children to complete homework every day, but nor was it unthinkable. Furthermore, when the children went to spend their summer holidays at the Australian school during Australian term time, there was an expectation by their Japanese teachers that their summer holiday homework would be completed, despite the fact that they were attending school in Australia and doing Australian homework. Thankfully there were no consequences when this was not achieved, so perhaps this seemingly impossible demand may be because Japanese educators must demonstrate the same expectations for all students regardless of individual circumstances.

Australian children had homework set from Monday to Thursday. Presumably weekends were children's time or family time. In contrast, Japanese children were given homework every day of the week, and thus considerable time on the weekend was devoted to homework. At one of the Japanese schools children were given a daily assignment of writing one hundred characters (*kanji*). Sometimes children were asked to write two hundred characters on Friday, to make up for having no school on Saturdays. Hence the notion of how children spend their free time stands in clear contrast; in Australia children's free time on the weekend was extended whereas in Japan it was reduced.

Not only are daily homework assignments longer in Japan, if the extra day of homework and the holiday homework is included, the Japanese children in this study appear to be spending considerably longer on homework than their Australian counterparts. This applies to time per day, days per week, and weeks per year.

### *Weekly Homework Contracts*

The aspect that differs most strikingly between the schools was the degree of responsibility for time management assumed by students.

According to the Primary English Teaching Association in Australia, "Children have other commitments and may not be able to complete homework at one sitting. They may be exhausted or unwell on any one day. They should have some *choice* as to when they complete the work. This also helps them develop good study habits." (Zammit, p.45) Children having control of when homework is done is achieved in the weekly homework contract from Year 3.

Year 3 children were required to choose one list of 10 words from three lists which had been grouped according to difficulty. These words ranged from simple words like 'make' to difficult words like 'technology'. Hence children could choose words according to their level. Children then had to do various exercises using their ten words. The first exercise was called Look, Cover, Write, Check (LCWC). Children look at the spelling of a word, cover the word, try to write it and then check against the original spelling. One contract involved doing LCWC three times, writing three sample sentences, create a word pyramid, write using fancy fonts, and a free activity.

Year 6 literacy homework consisted of contracts for spelling and English. The spelling contract outlined a checklist of twenty-seven possible activities to choose from. These included LCWC, arranging words according to alphabetical order or syllables, writing an acrostic poem, and writing synonyms and antonyms. The Year 6 English contract consisted of traditional activities such as a comprehension passage, spelling, vocabulary, grammar and punctuation. These were questions unrelated to creativity or critical thinking, but rather related to the mechanics of the language. The

comprehension exercise consisted of multiple choice questions based on the reading passage, the spelling exercise consisted of misspellings to be corrected. The vocabulary exercise was to underline those with the same meaning, and to identify homophones such as *key* and *quay* within a sentence. Grammar consisted exercises such as creating plurals from the singular form such as between *wife* and *wives*, and punctuation consisted of rewriting a sentences that had been written without any punctuation. These skills could be considered the foundations of English literacy. Unlike the junior primary school, where there had been an emphasis on self-expression and error correction was limited to a few key points, the upper primary school demonstrated gradually increasing demands over the mechanical aspects of written English.

Of note was that the spelling contract gave the child choice of a range of activities, the English contract gave no choice, and was restricted to content over which the teacher had control. Hence Australian homework at Year 6 can be considered a hybrid of pedagogical approaches. Whereas the spelling homework gave children some control over the content, the other English homework was entirely directed by the teacher and consisted of exercises that would reinforce essential written skills.

### *Pessimism- A Cultural Factor*

Modesty may explain the over or underestimation of the time taken to accomplish tasks in Japan. The foreign resident of Japan may be surprised at the pessimism expressed towards meeting requests and deadlines, which is thankfully not reflected in actual practice. When ordering something from a business, the time quoted usually exceeds the actual time for the goods to be received. An estimate tends to reflect the latest possible time. This tends to be in contrast to western business practices; not infrequently the customer has to wait longer than the estimated time for the goods to arrive. This

cultural difference regarding a pessimistic view of estimates of time may also apply to estimates of time spent on homework, underestimating the time actually spent.

## Conclusion

This study is essentially small scale since it only compares homework requirements of two children attending two primary schools in each country. Hence it is an inadequate basis to address Baker and LeTendre's (2005) conclusion that "in the most effective systems little homework is given" (p.14). It is likely that there are primary schools in Japan with less stringent homework requirements than those in this study, and Australian primary schools with greater homework demands than those in the present study.

However, at least in the schools in the present study, homework in the Japanese primary schools far exceeded that of the Australian primary schools, despite recent reductions in curriculum content in Japan. Even in these days of *yutori kyoiku*, at least some children in Japanese schools appear to spend considerably more time on homework than their Australian counterparts.

Firm conclusions cannot be reached on the basis of a small scale study such as this. Quantitative data would be required to achieve a fuller comparison of homework requirements between countries, but even this may be flawed by cultural tendencies to pessimistically estimate time necessary to accomplish tasks.

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