Recognition of diverse students' experiential and multimodal resources for access

Arlene Archer

Students come to Higher Education with a range of experiential and semiotic resources from their home and educational environments. Experiential resources include rural/urban lifestyles, local knowledges, and 'cultural capital' in the broadest sense (Bourdieu 1991). Semiotic resources include spoken, written, gestural, spatial and visual competencies. Some of these resources are valued in Higher Education, whereas others less so. This has implications for pedagogy, including assessment practices. For instance, some students may be able to perform better in an oral rather than a written exam, or in an assessment conducted in their home language rather than in English. Others may feel alienated from the content or structure of the assessment, as it may not have resonances in their previous experiences. 'Recognition' is about firstly seeing the resources that students bring with them, and secondly about valuing these resources by including them in the curriculum and in formal assessment practices. This recognition of students' resources is key to a transformative agenda in Higher Education. Yet, recognizing students' 'brought along' resources in contexts of high diversity (like South Africa) can be difficult. This paper proposes a social semiotic framework for assessing texts across modes and also outlines a number of principles for recognition of students' resources.

KEYWORDS   recognition, assessment, access, social semiotics, student resources

1. Introduction

Students come to Higher Education with a range of experiential and semiotic resources from their home and educational environments. Experiential resources include rural/urban lifestyles, local knowledges, and 'cultural capital' in the broadest sense (Bourdieu 1991). Semiotic resources include multiple languages, spoken, written, gestural, spatial and visual competencies, amongst others (Kress 2010). Some of these resources are valued by the academy,

whereas others are less so. This has implications for pedagogy, including assessment practices. For instance, some students may be able to perform better in an oral rather than a written exam, or in an assessment conducted in their home language rather than in English. Others may feel alienated from the content or structure of the assessment, as it may not have resonances in their previous experiences. Standardized basic skills testing feeds into a culture of competition and often benefits learners who are good at rote memorization. It produces figures that are comparable and easily interpreted. According to this view, 'standardized testing provides accountability to the system, easily digestible information to parents, and regularly updated knowledge of the progress and relative competencies of individual students' (Kalantzis, Cope and Harvey 2003: 16). However, knowledge today is highly situated and rapidly changing. Successful learners and citizens in the knowledge economy increasingly need to be autonomous and self-directed and to be designers of their own learning experiences (Kalantzis et al 2003). They also need to be flexible, collaborative, and able to work productively with diversity. There is a need for assessment practices that determine what learners know, and also make visible the resources that learners have.

For a few decades now, there have been arguments for the broadening of classroom practices to include multiple modes in order to increase access, equity and opportunities for engagement (Archer and Newfield 2014; New London Group 2000; Godhe 2013; Jewitt 2003; Towndrow, Nelson and Yusuf 2013; Silseth and Gilje 2019). 'Expanded forms of social and material practices associated with multimodal design can ... provide a platform for marginalized students to create complex texts' (Anderson, Stewart and Kachorsky 2017: 111) and could be a way of creating equitable opportunities for students to explore their interests and enact layered positionalities (Unsworth 2001). However, leaving these texts at the level of process rather than formally including them into the curriculum could work against access into dominant practices and formal inclusion requires that these texts be assessed and graded. It could be argued that some kinds of assessments that are standard practice in South Africa tend to disadvantage learners from culturally and linguistically diverse backgrounds, because the resources these students bring are not necessarily valued in the classroom context. This paper focuses on the ways in which multimodal assessment can facilitate 'recognition' of a range of student resources, whilst at the same time enable access to dominant academic forms. Formal education often closes down access to varied semiotic resources and well-thought through multimodal assessment practices could potentially recover 'recognition' of these.

2. Educational contexts in South Africa

South Africa is an instance of a multilingual, culturally diverse and recently decolonised country in which access to education remains largely unequal. The medium of instruction remains

predominantly English, although this is not the first language of many of the learners. Differential access to education remains and sometimes there is poor access to resources such as teachers, textbooks and computers. This has contributed to poor achievements on international literacy and numeracy tests, unsatisfactory matriculation results, high drop-out rates and low graduation rates. According to Scott (2017), meaningful transformation in Higher Education lies in 'the effective and equitable distribution of the benefits of higher education across the population. This cannot be achieved by access alone; access must be integrally linked to a successful completion of qualifications'. Given this situation, it is not surprising that there have been mass protests across Higher Education over the past few years calling for free, decolonized education. Disparities in access and a slow and disproportionate throughput of students are part of the reasons for the #Feesmustfall movement in South Africa and the call to decolonize Higher Education.

Students have multiple language systems to draw on, and there is often a fluidity of movement between languages, varieties, genres and discourses. In order to make visible the resources that a diversity of South Africans draw on, assessment practices need to acknowledge the agency of students in designing text. These assessment practices should encourage text-making practices in the classroom that are complex and creative (and may be counter-hegemonic), but must at the same time be supportive of the traditional goals of the curriculum (Newfield 2011). As an example of this, Newfield and Maugedzo (2006) show how a multimodal approach to pedagogy revitalized the poetry curriculum at a High School in Soweto. They report on how shifting the curriculum focus from analysis (the mainstream approach to poetry in South Africa) to composition, enabled the students to 'modalise' poetry in different ways – as a spoken form, as performance, and even as embroidered cloth. Changing the audience, meant the students could write poetry to different people and even produce a published poetry anthology. Here hegemonic language and pedagogic practices were challenged, whilst simultaneously providing access to dominant language practices.

3. Recognition of resources: agency and 'signs of learning'

Assessment deals with "a relation between that which was (expected) to be learned – explicitly as a curriculum or implicitly as 'experience' – and that which has been learned" (Kress 2010: 174). A big question for assessment is what constitutes 'data' for what has been learned. A common means of getting such data has been to ask students what they might have learned or how they felt that they had learned (Kress 2010: 174 – 175). Kress points out that this seems an unsatisfactory approach, both methodologically and in terms of semiotic theory. He proposes the notion of 'signs of learning', claiming that "signs made 'outwardly' … and are the best evidence that we can get for understanding the 'inner' processes of learning" (Kress 2010: 183).

It is clear that assessment has a powerful effect on what students do and how they do it.

Lederman and Warwick (2019) refer to the 'violence of assessment'. Assessment can undermine or build confidence, and is a major factor contributing to how students view learning within formal educational contexts. It is thus crucial that assessment is an integral part of curriculum design, and that students are fully aware of what to do to succeed. Assessment practices can be seen as falling on a continuum from 'judgement' to 'recognition'. 'Judgement' points to metrics of conformity, whereas recognition is about noticing resources in terms of some existing framework, making these resources visible and integrating them in a range of contexts (Archer 2014). Recognition is thus the positive side of assessment and if it happens multimodally, it may mean more diverse students' resources are drawn on in the process. This non-deficit view of student meaning making, what Kress calls a 'generosity of recognition', vastly expands the scope of what is given attention in the classroom. 'Instead of dismissing signs as 'error' and sign-makers as 'incompetent', assessors will be required to investigate and establish the semiotic principles applied by sign-makers, to describe their resourcefulness' (Bezemer and Kress 2016: 5).

Linked to 'recognition' is the notion of agency and design; a notion of 'learners as agentive, resourceful and creative meaning-makers' (Stein and Newfield 2006: 8). Meaning-making includes complex choices about conjunctions of meaning and form. When creating texts, people bring together and connect the available form that is most apt to express their meaning at a given time. The meaning-maker can choose to re-evaluate resources, assessing their appropriacy for immediate and changing contexts. I argue that assessment practices based on recognition can help to develop the ability to understand the notion of semiotic choice, to select or make judgements according to criteria, context and design. Even if choices are limited (by, for example, the resources available or students' competence in design), these choices still communicate important information about students' identities and learning and therefore are important to recognize when developing assessment practices.

4. Social semiotic framework for assessment across modes

Bezemer and Kress refer to the 'pressing issue of the development of apt forms of assessment for representations in different modes, treated as signs of learning' (2008: 193). Or, put another way, 'How do we or can we recognize learning when it is expressed in the non-dominant mode(s)?' (Kress 2010: 178). Different theorists have thought of varying ways of describing and assessing students' ability to design multimodal texts, rather than a narrow focus on aspects that can be 'conveniently measured'. For instance, Davis and Reed wonder if 'excellence in execution' (2003: 101) should contribute to the grading of students' multimodal projects. Lamb (2018) looks at the way that assessment practices are affected by the societal and pedagogical shift to the digital, for instance, how perceptions and practices around plagiarism

detection software can influence composition. Neal (2011) focuses on composing *processes*, including digital composing processes; Weiss (2017) incorporates students' *reflections* on the process of making, in combination with the final product.

My theoretical approach to assessing students' texts is developed from Halliday's (1978) social semiotic account. Halliday refers to three kinds of semiotic work called metafunctions. The ideational metafunction represents objects and their relations in a world outside the representation system. The interpersonal metafunction locates participants – individual, institutional, abstract – in a system of social relations, social viewpoints, evaluative orientations and affective identifications. The textual metafunction refers to the capacity to form coherent complexes of signs or texts. Textual meaning enables the producers and users of text to make and recognize patterns and relations so that the various elements in the constituting discourses relate to each other. What is important and useful about a Hallidayan view for assessment is that it works across modes, and also provides a way of looking at student meaning-making in terms of socially meaningful tensions and oppositions as instantiated through textual structure. Texts are conceived as being shaped both by students' understanding of the specific socio-discursive context and also by what students bring to the act of representation – their 'habits of meaning' (Halliday 1978), 'stock of knowledge' (Schutz 1970) or representational resources.

I will now look at each metafunction and consider aspects for assessment that work across modes.

4.1. Recognizing the ideational in students' texts

The content of students' texts and how it is configured through discourse constitutes the ideational. Important in terms of assessment is *what* content is selected, possibly the *criteria* for selection and the *discourses* which are drawn on to fulfil the communicative purpose of the text. 'Discourses are socially constructed knowledges of (some aspect of) reality' which give expression to the meanings and values of an institution or social grouping (Kress and Van Leeuwen 2001: 4). They are inextricably linked to value systems in particular contexts. It goes without saying that discourses can be realized through different modes or ensembles of modes. In recognizing students' resources, we can identify the discourses utilized, discourses evoked (provenance) and discourses referred to (intertextuality) in the organization of content. It is important to remember that no discourses exist in isolation, but within larger systems of sometimes different, contradictory or even opposing discourses.

4.2 Recognizing interpersonal aspects

The interpersonal metafunction is concerned with the ways in which relations between authors, audience and topic are constructed. Anderson et al (2017) emphasize 'rhetorical force'

and 'authorial stance'. They use 'rhetorical force' to highlight how students represent relations between themselves as authors, their audience, and their topics. They draw on Vasudevan et al's (2010: 461) concept of authorial stance as 'claiming a presence as an author and narrator of one's own experiences' (in Anderson et al 2017: 112). However, I prefer the concept of 'voice' when thinking about the interpersonal, as the concept of 'voice' can enable student awareness of their own agency within the constraints of academic practices. Although seemingly a mode-specific term, 'voice' comes with a particular history, and with particular theoretical affordances which allow us to look at text in a way that draws on theories of writing and an 'academic literacies' perspective. An academic literacies perspective takes into account issues of identity, institutional relationships of discourse and power, and the contested nature of writing practices (Lea and Street 1998: 159). The field of academic literacies has a long history of theorizing agency that a term like 'stance' may not have. I use the term 'voice' to refer to the way a sign-maker establishes presence in a text through the choice and use of semiotic resources (signifiers of authorial engagement), as well as positioning in relation to other sources (citation) and in relation to the audience. In other words, as I have posited elsewhere, voice can be thought of as being constituted through authorial engagement, modality and citation (Archer 2013). Both modality and citation 'realize and produce social affinity' (Kress and Van Leeuwen 2006: 176) through aligning the viewer/reader with the forms of representation with which text producers align themselves.

Recognizing 'play' or parody is also important in looking at multimodal texts. For instance, Crystal notes that 'language, punctuation, font, typography, layout and presentational techniques' (Crystal in Bearne 2017: 77) can be used in an unusual manner for effect.

Anderson et al (2017) also point to this notion of play but refer to it as 'entertainment', namely the 'humorous manipulation of author-audience relations from an intimate social distance' (2017: 114). This could happen through multimodal divergence, where, for instance, the writing passes critical commentary on the image. According to Buckingham et al (1995), there is almost always an element of parody in students' uses of dominant forms. Parody stresses difference while it 'challenges that which it parodies' (Crapanzano 1991: 431). It can be seen as 'a highly powerful and pleasurable means of developing students' mastery of form, in a similar manner to genre writing in English; and indeed could be considered to have a potentially 'critical' or deconstructive role' (Buckingham et al. 1995: 112).

4.3 Textual metafunction

The textual metafunction is concerned with principles of structure and is realized through composition and cohesion. Of interest here is how the text has been organized according to a specific audience and purpose, and how the text has employed layout, modes and design. In the assessment of multimodal texts, Bearne points to the use of a variety of 'technical aspects and conventions of different kinds of texts, including line, colour, perspective, sound, camera angles,

movement, gesture, facial expression and language' (2017: 77). As an example of mode-specific technical aspects, I will briefly look at what to consider in assessing a three dimensional artefact. Drawing on Kress and van Leeuwen (2006: 216), I posit that recognition of signs of learning in material artefacts include consideration of three aspects, namely choices around the surface of the artefact, the substance of the artefact and the tools used to produce the artefact. Firstly, the *surface* choices include the shape and form of the materialized artefact. Aspects such as the use of colour, surface texture, the use of light and shadow, can be considered here. Colour, for instance, contributes to meaning-making through meanings associated with particular colours and combinations of colours, hues, degrees of contrast, degrees of 'saturation' and 'purity' (see Kress and Van Leeuwen 2002). The second aspect to consider in assessment of a material artefact is the *substance*, namely the physical 'stuff' or material out of which the artefact is made, such as iron, wire, paper. The physical materials could be raw or processed, natural (such as wood, bone, stone, shell) or synthetic (such as plastic or rubber). They could also be durable materials (such as cement) or non-durable materials (such as food). The third aspect to consider is the *tools* and the traces of the tools used in the production of an artefact. The traces can include scraping or marks from hammering or chiselling, pen inscriptions rather than printed ink, or erased pencil marks. In summary, the surface and substance of the artefact, together with the traces of the tools of production are fundamental in recognizing the material realizations of designed artefacts. Each aspect offers different meaning-making potentials and is thus worthy of consideration in the evaluation or assessment of these artefacts.

Related to the above idea of mode-specific technical aspects, is the notion of '*versatility*'. To what extent does the text demonstrate 'versatility' (Beneke 2018) in the employment of mode-specific technical aspects. Versatility here means the range of resources employed and how they are employed (to, for instance, create cohesion, tension, humour, surprise) within the affordances and constraints of the task and genre. Another aspect to consider in terms of the textual metafunction is whether the *composition* of the text has been organized according to a specific audience and purpose, and with attention to design, layout, and use of modes. This includes considerations of directionality, positionality (top/bottom, centre/periphery, left/right), salience (framing, foregrounding/backgrounding). Finally, the *cohesion* of the text is of importance, including cohesion between meaning-making modes, such as visual-linguistic (Martinec and Salway 2005); audio-visual (McKee 2006), gestural-spatial (Martinec 2001) and visual-linguistic-spatial (Kress and Van Leeuwen 2006). Of course, cohesion can sometimes go hand-in-hand with 'tension'– 'semiotic dissimilarity, distance and discontinuity present in texts' (Fajardo 2019: 179). Textual tension has creative potential and can force the reader to 'react, engage, draw conclusions' (Engebretsen in Fajardo 2019: 179). This idea of tension relates to the points made above about contesting discourses and even parody. See table 1 below for a summary of the framework for assessment across modes.

Metafunction	Aspect to recognize in assessment	Details
Ideational What content is selected and discourses drawn on to fulfil the communicative purpose of the text?	Content	Selection and coverage of content (and mode) for a specific audience
	Discourse	Discourses drawn on, evoked and referred to in the representation
Interpersonal How are relations between authors, audience and topic constructed?	Voice	• Authorial engagement • Modality • Citation
	Play and entertainment	• Humorous manipulation of language, punctuation, font, typography, layout • Manipulation of author-audience relations (e.g. through multimodal divergence)
Textual How has the text been organized according to a specific audience and purpose, and how has the text employed design, layout, and use of modes?	Versatility	Range, applications and configurations of resources employed for a particular task and audience.
	Mode-specific technical aspects	• Line, colour, sound, camera angles, gesture, language • Materiality – surface, substance, traces of tools
	Composition	• Directionality • Positionality (top/bottom, centre/periphery, left/right) • Salience (framing, foregrounding/backgrounding)
	Cohesion	Intermodal cohesion and tension

Table 1. Framework for assessment across modes

The framework focuses on recognizing or making visible signs of learning in students' textual *products*. However, it is important to see product in relation to *process*. A 'sign of learning' has process built into it as it 'shows some difference in the capacities of the learner in their making of signs as the result of learning' (Kress 2010: 175). The descriptors for multimodal assessment in the framework can be applied to 'process' texts such as portfolios, drafts and reflections. However, we also need descriptors for assessment which focus on the process of production, with the aim of outlining 'progression in text composition' (Bearne 2017: 77). These descriptors could include looking at students *increasing ability* to: decide on content and mode for specific purposes and audience; organize texts for communicative purposes; use technical features for effect; and reflect and develop. The paper concludes by looking at some of these aspects, but also focuses on broader principles for recognition in assessment practices.

5. Principles for recognition

The functions of assessment practices are 'fundamental to the kind of learning that is recognized' (Kress 2010: 183). Here some underlying principles are outlined which could assist in the design of multimodal assessment practices to facilitate recognition of a range of students' resources, whilst at the same time, enable access to dominant forms.

5.1 Align production and assessment practices

Even though learners are often provided with opportunities to engage with multimodal learning resources, these resources are not always included in the process of assessing students' learning trajectories, resulting in a decoupling of production practices and assessment practices (Silseth and Gilje 2019). For instance, to refer back to Newfield and Maugedzo (2006) mentioned earlier, there would be non-alignment of production and assessment if the students produced and performed poems in class, but then only did critical analysis in the assessment tasks. If learners are provided with opportunities to engage with multimodal learning resources, these resources need to be included in the process of assessing students' learning trajectories, thus aligning production practices and assessment practices.

5.2 Transform rather than use resources

A multimodal approach stresses the making and production of meaning, rather than the acquisition of received knowledge or critique of received knowledge. Fundamental to assessment for recognition is the concept of transformation, that meaning-making does not so much involve *use* of a system, as the *transformation* of available resources. Here human agency and resourcefulness are placed at the centre of meaning-making. Examples of criteria for assessment according to this approach would include the recruitment of 'apt' resources for meaning-making; how connections are made across modes and genres; discernible authorial voice; insightful reflection on the process of making; and taking into account the formative feedback of others in the process.

5.3 Make resources visible

Assessment for recognition makes visible those resources often not noticed or valued in formal educational settings. Kress asks 'what is visible to the "eye of assessment"? What is it possible, actually, to see?' (2010: 178). One way of making resources visible is through the varying of assessment tasks which allow different resources to surface and to be valued, for example, including exhibitions, performances, and a range of genres and audiences. Kalantzis et al (2003: 17) ask: 'what kinds of learning will be durable, and how can we measure these?'

They propose a number of different assessment techniques: *project assessment* that involves planning, collation and presentation of material; *performance assessment* that involves planning, doing and completing a task; *group assessment* of collective work or the collaborative capacities of individual group members; *portfolio assessment* that involves documenting a body of works undertaken by an individual. This broad range of assessment strategies focuses on the 'performance of tasks, the planning and completion of projects, group work and the presentation of portfolio work' (2003: 25).

5.4 Negotiate assessment practices

Assessment can be seen as an ongoing activity in which the meaning and function of the activity are negotiated by teachers and students in and across changing contexts and situations. The ways in which students are assessed has implications for how students are positioned in classroom practice (Silseth and Gilje 2019). Fajardo argues that before teachers begin formal assessment of multimodal compositions, they could 'teach students how to deconstruct their own and one another's digital compositions'. By doing so, 'they will be able to recognize the varied ways of conveying meaning through a combination of semiotic modes and the effect these create' (2019: 191). Quinn (2015: 3) argues that assessment is about developing judgement in students, where peer and self-assessment actively 'promote the development of students' capacity to make judgements about their own and others' work'. Negotiating assessment can be achieved through a number of strategies, such as participatory goal setting; encouraging self-reflection through grade negotiation; negotiating criteria with the learners (Davis and Reed 2003); critiquing and adapting criterion-referenced assessment grids; and interactive peer assessment – what Newfield et al (2003: 78) call creating a 'community of arbiters'.

5.5 See product in relation to process

The idea of process is core to assessment for recognition. By valuing process texts such as portfolios, drafts, reflections, students get to reflect on their 'processes of making in different representational forms' (Newfield et al 2003: 79). Reflection is important as a part of process as it 'examines past experience in the light of other connections and alternatives. It is a reconstruction of actions taken; it is a re-look at meanings made' (Doll in Newfield et al 2003: 76).

5.6 Develop metalanguages for multimodal textual constructions

Recognition of resources can be achieved through developing appropriate metalanguages. Metalanguages of 'reflective generalization that describe the form, content and function of the discourses of practice' (New London Group 2000: 24) are important in achieving conscious awareness of the nature of the resources being used. These metalanguages can then feed into

the language of the criteria for assessment purposes across a range of genres and modes. It is important that metalanguages (as well as criteria for assessment) should be seen as a set of questions; enabling recognition of what is there, not what is not there. Davis and Reed (2003) ask 'is it possible to frame criteria that scaffold a multimodal task and at the same time encourage innovative responses?' I would argue that it is, especially if you see a metalanguage as a set of questions rather than something prescriptive. Criteria can be seen as guidelines and assessors should be open to 'the unexpected creative, innovative ways in which students may choose to respond' (Quinn 2015: 3). It is therefore important to include criteria related to 'criticality, creativity and innovation' to signal what is valued in Higher Education.

6. Final comments

This paper has argued for assessment practices that make visible the resources that learners have. It has proposed a social semiotic framework for assessing texts within and across a range of modes. This framework is clearly not exhaustive or in any way prescriptive, but provides a set of potential questions to ask of students' texts, rather than a list of criteria for assessment in any formal sense. I have argued for the importance of aligning production and assessment practices, transforming rather than merely using resources, negotiating assessment practices, seeing product in relation to process, and developing metalanguages. Transforming existing resources and designs involves a certain messiness and sometimes even contradictions. Multimodal assessment involves 'recognising, flagging, recording, layering, interpreting and reflecting' (Newfield et al 2003: 68). It involves taking risks and seeing risk as productive (Thesen 2014). This approach has the potential to make classrooms more democratic and inclusive, enabling marginalized students' histories, identities, languages and discourses to be seen.

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Arlene Archer is an Associate Professor in Applied Linguistics and the Director of the Writing Centre at the University of Cape Town.

E-Mail: Arlene.Archer@uct.ac.za